Determinants of Work Attributes and Personality
Aspects towards Employees’ Job Satisfaction

A Thesis submitted for the Degree of Doctor of Philosophy

By

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I affirm that all the content in this thesis that is not mine, to the best of my understanding, has been acknowledged. The substance presented in this thesis has not been submitted in the past by the author for degree at this university or any other.

However, during preparation of this dissertation, some publications were prepared as following. Remaining part of thesis has not been published yet.


Dedication

To my parents for their continual love and support which helped me to achieve my vision.
Acknowledgment

The completion of this study represents a momentous turning point in my life. It has been a long journey and has demanded a lot of effort and time. Many people's patience, support and constant support helped bring this work to life.

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Thank you for the strength you gave to me. I love you all!
List of Abbreviations

CFA  Confirmatory Factor Analysis
CV   Convergent validity
DV   Dependent Variable
DV   Discriminant validity
EFA  Exploratory Factor Analysis
Esprit Esprit de corps
Effi self efficacy belief
IV   Independent variable
Job  Job satisfaction
Justice Procedural justice
M    Mean
MANOVA Multi Analysis of Variances
MBBS Bachelor of medicine and Bachelor of surgery
PLS  partial least square
SE   Standard Error
Sig. Significant
SPSS Statistical Package for Social Sciences
α    Cronbach’s alpha
UK   United kingdom
USA  United stated of America
Abstract

Organisations are constantly dealing with challenges to stay on competitive and doing well, that induces organisations to consistently reassess their plans, formations, course of actions, procedure, and development to remain cost-effective and retain effective workforce. To keep employees highly motivated, content, and effective is however a focal and major issue in the domain of employee job satisfaction because of enormous human involvement. Consequently human resource managers are keen to find the strategies to keep their workforce fully motivated and dedicated to their jobs.

In this study dissimilar from prior studies researcher has applied work attributes (Herzberg, 1968; Adams, 1963) and personality aspects (Judge et al, 2001) to examine the relationship of work attributes and personality disposition with job satisfaction. In current era of Information technology revolution organisations across the globe confronting several challenges on different counts including to keep workforce motivated and effective to gain maximum from their skills. Keeping workforce motivated to reduce tardiness, absenteeism, misuse of resources, and turnover are major issues of concern in the domain of employee job satisfaction and human resources management. Therefore, human resources management practitioners, managers, and policy makers are enthusiastically concerned to know about the factors that may help to make workforce effective, motivated and contend with work. The aim of this Doctoral thesis was to study the determinants of employee job satisfaction. The objectives were to explore the organisational work attribute factors and employee personality aspects in Public healthcare sector of Pakistan Where various reforms introduced after implementation of new health policy called Health for All(HFA) lately. This study was categorised in seven parts staring with introduction stating the setting of the study which covers background of this empirical study and supplies the transparent context information. In second phase systemic carefully carried literature review led to theoretical frame work and hypotheses development in third phase. Onwards Survey Questionnaires were administrated to General physicians working in
public hospitals for data collection purpose. Descriptive statistics, multi analysis of variance, and exploratory factor analysis with the help of Statistical package for social science (SPSS) was applied to analyse the data, hypotheses testing and confirmatory factor analysis were done with the help of structural equation modelling(SEM). Outcome generated discovered that perception of procedural justice, on job training, working conditions, esprit de corps (team work) and personality aspects self esteem, and self efficacy belief, were significantly and affirmatively correlated and neuroticism personality aspect negatively correlated with employee job satisfaction. However, employee job clarity, task significance perception and personality aspect of locus of control orientation were not found to be related with job satisfaction. Implications and recommendation of research for employee job satisfaction are also discussed.
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Chapter One: Introduction

This introduction provide information about overall overview of the study. This doctoral thesis is related to discover the predictors of organisational work attributes and employee personality disposition to measure employee job attitude and behaviour for job satisfaction. This study explore job satisfaction among health care professionals (Doctors) working in public hospitals in Pakistan. Job satisfaction is concerned with attraction and exuberance that employee derive from the job. Numerous organisational studies researchers are keen to study and understand the topic of employee job satisfaction because employee job satisfaction is an important attribute to understand organisations and individuals who performing different tasks within them. In present era with the revolution of information technology, globalisation challenges, accommodating employment, and elevated mobility in many parts in the world organisations facing problem to keep their workforce motivated and satisfied. In the microcosm of Health organisations, the healthcare professionals’ affect can be very significant and reflective for best health care service to general public in any country. Hence it is very important to develop employee job satisfaction and it is very difficult to avoid employee job satisfaction. In result it is very important for all stake holders in health care system to make health care professionals work environment satisfactory to get quality health care service. Several research studies examined and analysed the determinants of job satisfaction and have studied several applications to western perspective. Though, in the context of south Asia generally and Pakistan particularly, the phenomenon is relatively very new, unclear and what extent health care professionals feel satisfied in their jobs and what counts for their level of motivation and satisfaction. Of immense substance is the actuality that individuals have different level of reactions, perception, beliefs, opinions regarding reality, and attitudes to predict their job satisfaction. In consequence Human resource management practitioners, managers, and policy makers require understanding as much as possible about the employee perception and feeling about their work and satisfaction. The understanding of this phenomenon will support management and policy makers to understand employees’ behaviour and attitude for job satisfaction.
This study has empirically examined the relationship of organisational attributes and employee personality disposition aspect to predict employee job satisfaction in health care organisations situated in Pakistan. In beginning this chapter set up the background of the study and concise description of background of the study is provided. After background portrayal the researcher has stated the aim and objectives of the current thesis. In addition in this chapter researcher clarified the context of the study, contribution of this thesis to the knowledge and in the end the organisation of thesis is reported.

1.0 Background to the research problem

This study examined the impact of organisational work attributes and personality aspects to employee job satisfaction. The aim of this Doctoral thesis was to examine the determinants of employee job satisfaction. The objectives were to look at the organisational work attribute factors and employee traits features in Public healthcare sector of Pakistan

Pakistan health sector has numerous challenges in spite of expansion and reorganizations. The strategic issues persists the sluggish growth in making advancement in successful health effects. Moreover there is a requirement to attain enhanced efficiency and excellence in health care provision because of enhanced client anticipations (Ministry of Health, National health policy, 2009). Health care professionals are subject to high level of stress and emotional exhaustion (Kinzl et al, 2005) For instance they come across exceptional work related stressors such as dealing with death, and mourning families, on regular basis. Besides that health care sector infrastructure in Pakistan is poorly located and inadequately equipped which has far reaching impact on health care professionals job attitude and motivation level (Ghaffar et al, 2000). Employee job satisfaction not only reduces absenteeism and increase efficiency but also help to provide quality service to end users of such service or product. Health care professionals’ job satisfaction results in not only effective and efficient work force but also result timely and accurate diagnose and cure of disease
(Lederer et al, 2006). Hence health care managers are keen to device strategies which help employees to develop positive attitude towards their work to determine job satisfaction or contentment. As result In today’s contemporary age, the function played by job satisfaction in organisations is becoming more and more noticeable and substantial. Sousa et al, (2000) stated that Job satisfaction is based on dependability between work role inputs (pain)- like education, working time, effort, and work out puts(pleasures) like wages, fringe benefits, repute, job importance, working circumstances, and fundamental aspects of the job. If there is balance between the inputs and outputs then employees are likely to express job satisfaction. Numerous studies like Chen etal (2000); Noryati et al (2009); Miller et al (2009); Srivastava et al (2010); Chang et al (2010) ;Chang et al (2010) reported that job satisfaction depend on individual employee personality disposition where as other group of human resources management scholars suggested that several organisational attributes are important to determine employee job satisfaction(Ellickson etal 2001; Lederer etal2006; Schmidt2007; Chang2007). However, there is no one conclusive model which addressed both organisational attributes and personality disposition to determine employee job attitude for job satisfaction. Realising the absence of unique theoretical model that not only at the same time addresses the work attributes but also personality disposition. This study attempted to fill the void by amalgamating work attributes and personality disposition aspects in unique formation as have not ever been done before in other study from health care professionals’ perspective.

Therefore, this study endeavours to progress on prior studies in providing empirical support of work attributes and personality disposition by deterring their influence to predict employee job attitude towards job satisfaction. Since previous studies have not clearly identified the role of work attribute s and employee personality disposition to determine the job satisfaction from the health care professionals working in public sector’s perspective. The present study tries to lessen this gap by examining the relationship between work attributes, personality disposition aspects, and job attitude to predict job satisfaction from health care professionals’ perspective working in public hospitals in Pakistan.
1.1 History and Geographical position of Pakistan

The Pakistan is located in the region of south Asia. Pakistan shares an eastern border with India, and north-eastern border with china. Republic of Iran is in south-west and Afghanistan in western and northern edge. Whereas, the Arabian Sea is in the southern boundary with the costal line stretched up to 1064 kilometres. The Pakistan has a total area of 796,095 square kilometres and approximately four times the size of United Kingdom (InfoPak, 2010). As per estimates of federal bureau of statistics for year 2010, the population of Pakistan reached to the figure of 184 billion (statistics division, 2010). According to last census Pakistan has very dense population with approximately 166 people per square kilometre and divided in four provinces namely Punjab, Baluchistan, Khyber Pukhtoonkhwa and Sindh (Statistics Division, 2010). There are about 20 different languages spoken in Pakistan the most commonly spoken languages are Punjabi, Pashto, Baluchi, Sindhi, and Urdu. The other prominent languages spoken are Shina in northern areas, Hindko in Pukhtoonkhwa, Brahui in Baluchistan, and Punjabi variant seriaki in Punjab (US Library, 2010). Pakistan is principally a Muslim country with 95% Muslim population (InfoPak, 2010) though the practising Muslims who follow the teachings of Islam are far less than estimated figures, While, the remaining 5% minority population of Pakistan include mainly Hindus, Christians, and other minorities such as Zoroastrians (US Library, 2010).

Pakistan’s economy has significantly grown in recent years and GDP gross domestic product increased by 5.6 in year 2007-2008 financial years. The growth rate in last five years recorded is about 6.6 percent per annum. The total spend of health sector budget is Rs.60 billion and about 0.6 of total budget. Population in Pakistan is growing with rate of 1.80 percent and state machinery is striving hard to stabilise the population growth by 2020 (Pakistan Economic survey, 2008-09). According to Statistics division Government of Pakistan (2010) Pakistan per capita income in terms of US dollar has increased at the rate of the 13.5 percent in last six years rising from $586 to $ 1102 in financial year 2009/10. The main reasons identified by the state for sharp rise in per capita income in those years include four times increase in foreign workers’ remittance and stable exchange rate.
In terms of civic services like health and education conditions are not very promising, however, steady growth is taking place. Literacy rate has steadily risen and according to latest figures among male population literacy rate is about 67 percent while female literacy rate is approximately 45 percent according to official statistics (InfoPak, 2010). There are presently 23, 1,289 educational institutes with approximately 1.37 million teaching staff in Pakistan. Government also increasing research and development culture activities and awarded about 6000 PhD scholarships over the last few years in Pakistan (Pakistan Economic survey, 2008-09). In terms of health sector wise approximately there are 945 fully functioning hospitals in Pakistan (country four times bigger the UK) & 935 maternity and child health care units. The doctor and population ratio in Pakistan is very dismal with one doctor per 1225 people. The poor comparison depicts the general health care facilities in country for people of about 180 million according to recent figures (statistics division, 2010). The life expectancy in Pakistan for male is 64 and for female is 66 years. Information technology is also gaining momentum in Pakistan and country has about 3.5 million internet subscribers and more than 17 million users of internet. In Pakistan approximately 3008 cities and town are connected to internet facilities and many more to be in future plans of government (Pakistan Economic survey, 2008-09).

1.2 Scope of the study

In today’s modern era, the role played by job satisfaction in organisations is getting more and more noticeable and significant. The subject of job satisfaction has been one of the extensively researched and examined topics in the domain of organisational studies and Human Resources Management. Arnold and Feldman (1986) define job satisfaction as “the amounts of overall positive affect (feeling) which one has about his/her job” According to early organisation theorists like Abraham Maslow and Frederick Herzberg “Job satisfaction is caused by individuals’ desire to fulfil personal needs that consists of intrinsic and extrinsic needs. Following this theme it might be argued that job satisfaction is determined by the degree to which job characteristics will fulfil employee/person needs.(Ting 1997) .According to Sousa-
Poza and Sousa-Poza job satisfaction is determined by the balance between inputs and outputs. Human has basic and universal needs and that, individual needs are fulfilled in their current situation, and then that individual will be happy (Sousa et al, 2000).

Authors further suggested that Job satisfaction is based on steadfastness between work role inputs (pain)- like education, working time, effort, and work out puts(pleasures) like wages, fringe benefits, status, task importance, working conditions, and intrinsic aspects of the job. If work outputs (pleasures) are compatible with the work role inputs (pains), then it is to be said that job satisfaction increases and feel motivated. Well being at work is Job satisfaction that an employee derives from work. The study of alternative opportunities and withdrawal decision empirical study by Hulin et al (1985) suggest that employee job satisfaction count on the balance between inputs like education, working time, effort and work aligned outputs like benefits, prominence, working conditions, and intrinsic/personality aspects. Consequently if work related outputs are in accordance with work related employee inputs, then job satisfaction is likely to enhance. It is often argued by Human resources management and organisational studies researchers that the satisfied workers should perform well and be more efficient, however, the direct link between satisfaction and higher performance has not established up till now (Souza et al, 2000). It has been observed that lower satisfaction causes higher rate of absenteeism and increased turnover among employees (Vroom, 1964). In present rapidly changing times job satisfaction is one of the important and focal variables in work and organisational studies domain (Kinzl et al, 2005). Job satisfaction is often viewed as foremost antecedent of working life quality (Olson et al, 1990). Number of the factors such as the quality of the relationship among the work group, the level of fulfilment of work, fairness and chances of advancement may have impact on employee job satisfaction and literature suggest that healthcare professionals (i.e. physicians) work satisfaction has straight correlation to patient satisfaction (Neuwirth, 1999; Kinzl et al, 2005). Motivation behind studying the concept of job satisfaction is related to the rapid changes taking place in organisational set around the globe and Pakistan is no exception.

A fast pace shift has been observed from manufacturing to services industries in many countries and there is an added need of professional workforce. In addition it is
observed that in service sector a direct and positive correlation resides between employee satisfaction and clientele satisfaction (Fosam et al, 1998; & Rogers et al., 1994). The organisational studies literature state that enhanced satisfaction makes employees more engaged and more motivated to do well in their jobs which will ultimately have positive impact on organisational level outcomes (Harter etal, 2002; Deci et al, 1985; & Fulmer et al, 2003). Literature indicates that employee satisfaction has linkage to the organisational performance as significantly as customer satisfaction. Employees in any organisation act as internal customers of the business and when they are satisfied with working environment they become willing to cooperate with the business of organisation to attain the goals of organisation (Chen et al, 2006). According to Mohr et al, (2010) the overall job satisfaction of health care professionals is specifically important to patient outcomes. In addition they further suggest that good patient care demands that health care professionals not perform their own job well but also act in a group with others in way to improve quality service. Result of satisfaction will be more motivation and cooperation for the purpose of better patient care and also enable health care professionals to be more compliant with clinical guidelines and evidence dependent exercise (Mohr et al, 2010). Employee job satisfaction in organisation mostly affects employee attitudes, behaviour, and motivation regarding employee turnover, effectiveness, and absenteeism. Employee dissatisfaction results in anxiety, withdrawal behaviour, higher quit rate, rise in absenteeism, and low productivity among employees. Hence the experts of organisational studies are concerned to find out the predictors and reasons to make employees motivated. A carefully undertaken literature review by this study identified that employee attitude, behaviour, belief, personality disposition and organisational attributes greatly influence to predict employee job satisfaction (Sousa, etal, 2000; Hulin et al, 1985; Ellickson etal, 1997; & judge et al, 1997). The organisational attributes and employee dispositions factors to predict employee job attitude for job satisfaction might be related to individual employee psychology, and organisational work characteristics(Malik etal,2010; Srivastava et al, 2010; Lambert et al,2007; Colquitt et al, 2001& Judge et al, 2001). In organisations employees develop their job attitude and motivation on the basis of organisational environment and their own personal disposition which assist them to apply their skills abilities, and experience to get the assigned job done effectively. Organisational environment or
organisational work attributes might support an employee job attitude for job satisfaction and motivation to perform various assigned tasks effectively in organisation. Conducive organisational work attributes might help employee to enhance job satisfaction and employee expect to fulfil his/her need, desire, and anticipated achievements. Consequently the numerous studies have been conducted and the experts in the domain of job satisfaction studies are engaged to find out and examine the predictors that assist employee to develop their behaviour and job attitude for employee job satisfaction (Boyt et al, 2005; Jaworsky et al, 1993; Kloep et al, 1994; & Sharp, 2008). Employee job satisfaction might be predicted by exploring and analysing the factors that belong to organisational work attributes and individual employee’s own personality disposition. On the grounds of organisational work attribute and employee personality disposition the conceptual framework for this research work has been developed which follow the employee personality and organisational need to predict employee job attitude and motivation for job satisfaction (Adams & Bond, 2000; Benjamin et al, 1990). According to Oldham et al, (2010) the existence of certain work attributes in organisation increases the possibility that the individual employee will find work meaningful and will feel more responsibility for the outcome of that work and ultimately feel less alienation and more satisfied.

The focus point of this thesis is to examine the role of organisational work attributes in relation to job attitude and employee disposition factors to predict employee job attitude and motivation to express satisfaction (Bradley & Brian, 2003; Steel & Warner, 1990; Baldwin & Farley, 1991). The literature on employee job satisfaction identifies that organisational work attributes such that perception of justice, teamwork, on job training etc and employee personality aspects may have impact on employee attitude and behaviour to predict employee job satisfaction (Elish et al, 2009; Cropanzano et al, 1997; & Caprara et al, 2007). Studies suggest that improvement in organisation work attributes, fairness in procedures, and fulfilment of employee psychological needs greatly influence to predict employee job satisfaction. If an employee in organisation is comfortable organisational work attributes and his psychological needs are appropriately addressed then employee will take more
interest in work and find his work more meaningful and this will consequently result in job satisfaction and effective work outcomes.

This research work was carried on in Public sector of health care organisations based in Pakistan where the health care is not in very good state and managed very poorly (Khurshid, 2010). According to World Bank report (2007) statistics health care per capita expenditure which includes the provision of health services (preventive and curative), family planning activities, and nutrition activities is very low to Just $23 dollar in Pakistan. Diseases like tuberculosis, Malaria, and respiratory infection which are preventable still account for main contributor to fatality rate in the inhabitants (World Bank, 2007). In Pakistan also following the international trend the delivery in health care system is more towards the following professional private sector development approach rather traditional charity state own system (March & Schroyen, 2005) . However, main source of health care service in Pakistan is still public sector state owned hospitals (Khurshid, 2010).

In present Pakistan healthcare system is suffering from many epidemics such as resource paucity, corruption, malpractice, and inefficiencies (Abbasi, 1999; & Islam, 2002). Pakistan spending on health care is also minimal to just less than 1% percent of its GDP in comparison to United Nations minimum spending of 4.4 percent of total income (UNDP2000). A considerable disproportion also exists between health care facilities in cities and rural population in Pakistan. Rural areas in Pakistan constitute about 68 percent of total population and which has very limited health care services available and mainly rely on untrained quacks to get treatment for most of their ailments (Ali, 2000; & Arif et al, 2000). Policy matters pertain to health care in Pakistan are decided central government level by ministry of Health, Planning and than those policies are trickled down to provincial level and district level (Hakim, 1997). According to (Adrian et al, 2002; Cropanzano et al, 1993; Manjlovich et al, 2002 & Chen, 2008, Ishfaq, 2010) employee can develop their job attitude and motivation with the support of organisational work attributes and personality disposition and these factors might assist to predict significantly to employee job satisfaction among individuals in Pakistan. This anticipates examining the factors such that organisational work attributes and employee personality disposition in context of the Pakistan to assess employee job attitude for job satisfaction.
This study anticipates assessing the magnitude of organisational work attributes and personality disposition to measure employee job attitude and behaviour in public sector health care organisations based in Pakistan. The basis for this study is that health care organisations in Pakistan where performance of healthcare professionals to provide better health care service is very poor and health care provision is in very bad shape particularly in public sector health care organisations across Pakistan and there has been very low level healthcare services in public hospitals in country.

1.3 Aim and Objectives of the Study

Realising the importance of employee job attitude and motivation for job satisfaction, it is very imperative to look into further the antecedents of job satisfaction. The aim of this thesis to prepare a conceptual frame work which elaborates how employees in public organisations in Pakistan determine their positive attitude and job behaviour in perspective of job satisfaction.

This research study aspires to explore the predictors of organisational work attributes and personality disposition for employee job satisfaction. This thesis intends to highlight the following major research objectives.

1. To examine the relationship of organisational work attributes, and personality disposition predictors to employee job attitude for employee job satisfaction
2. To test the conceptual model in Pakistan which assist researcher to determine the validity of western theories in the context of developed country
3. To observe organisational work attributes and employee personality disposition predictors impact in health care public organisations in Pakistan where health care sector is poorly funded and neglected
1.4 The Context of the Study

Employee job satisfaction in present technologically advance modern organisations are considered one of the central factors. As a matter of fact job satisfaction is dependent on number of multifaceted variables. An employee serving in organisation may be contented with one of the job aspect but simultaneously be discontented with another aspects concerned to the job. Giving the instance of Doctors in public hospitals may express satisfaction with their job to some extent but may not be contend with numerous facets of their job (shakir et al, 2007). Doctors’ job contentment has implication to their behaviour with colleagues, hospital management, and mainly to the serving patients- doctor relationship (Knizl et al, 2005).

The health care sectors that existing in public sector in Pakistan currently facing numerous challenges and pressure from different fronts. In order to face the modern world technological advancement the Government has made time and again wide-ranging initiatives to bring reforms (Tarin et al, 2009) According to latest figures Pakistan has population nearly 180 million with 1085 US dollars per capita income (InfoPak, 2010). This indicates that Pakistan is on the crossroads on economic prosperity at the same time as facing the severe problem of underdevelopment. Improved child survival plans, enhanced health care systems and economic growth have observed downward trend of infectious diseases and existence of continual conditions (Ghaffar et al, 2010).

In order to bring reforms in health care sector and to make it more effective and successful, the health care public sector run institutions need to strive for better quality medical care service. The better quality health care and patient – doctor relation is also very much linked and dependent to doctors’ job satisfaction. This anticipates the need of more and more highly motivated health care professionals in Pakistan to improve health care system and prosperity in the country (Aasland, et al 2010; Tarin et al, 2009). According to Warren and others(1998) Medicine seemed to be model of career and working group characterised by specialised technical knowledge, public faith, and scientific authority. On the other hand, transformation during last two decades in particular reference to increase in patients’ right have led to
the argument that this profession has lost its status as profession (Mckinlay, 1988; & Mckinlay et al, 1989). Health care professionals (i.e. Physicians) satisfaction is a significant issue not only as far as physicians are concerned but also for healthcare management and patients. Physicians’ satisfaction will address two issues simultaneously. One is when they are contend with their job they are considerably more likely to continue in practice on other side patients may get not only better constancy of care but also enhanced quality of care services (Skolnik, et al, 1993). Physicians satisfaction phenomenon may clarify the why the physicians work contentment and patient satisfaction are strongly concurrent (Shakir et al, 2007; Warren et al, 1998).

Economic prosperity of any country is highly linked to the health of its citizens. Despite the fact that the developed countries are still suffering from lethal chronic malaise and have prevalence of widespread infectious disease fatalities and deaths (Schieber et al, 1999). In Pakistan it is widespread familiarity that Public hospitals are overloaded whereas private hospitals are beyond the affordability of most of common citizens. The problem is further adverse in rural areas where people have access to very limited health care facilities. In rural areas there is network of healthcare system beginning from basic health units (BHU) to tertiary hospitals in urban centres. Regardless of this extensive set-up majority of people in Pakistan do not get access to health services (Khurshid, 2010; Abbasi, 1999). Pakistan health outlook in contrast to neighbouring states is not very impressive and leading indicators such as life expectancy is lower and health aligned indicators such as infant death and deaths under-five is higher (Khan et al, 2006). First health policy in Pakistan introduced by the then Government in 1990 with the title of national health policy to address the growing health care problems and improve health conditions in Pakistan (Pakistan, 1990). The theme of this healthy was to bring reforms in health care sector by providing more assistance to health sector for prevention of disease and support of health in accord with the parameters of public health (Pakistan, 1997). The present Government announced the national health policy (NHP) in 2009. The NHP has envisaged that new policy aims to address the health problems by adopting wide ranging plan of combating illness and health promoting initiatives in line with World health organisation(WHO) Health for All(HFA) strategy(Pakistan,2009).
Health for all (HFA) programme is aimed to create understanding among masses that health policies in Pakistan give consideration to not only the health care aligned service but also to the socio economic and environmental uplift predictors of health as well (Naido et al, 2000; & Pakistan, 2009).

The employees are perhaps the most significant contribution to any health organization and have a formidable bearing on entire health system execution. Agreeing to World Health Organization (WHO), there is an international projected dearth of 4.3 million health workers, mainly concentrated in south Asia (Malik et al, 2010). Multiplying this problem are depleting levels of health care provider enthusiasm. It has over and over again been acknowledged as a dominant problem in this human resource predicament and subsequently, health provision delivery and quality (Lederer et al, 2006). Pakistan has one of the biggest public sector-maintained service deliverance set-ups in the world (Pakistan, 1990). Pakistan is placed 122nd matching to the WHO classification of the world’s health organisms and at this time has 0.73 physicians and 0.31 nurses per 1,000 residents (InfoPak 2010). According to latest figures approximately 2000 medical practitioners every year migrate from Pakistan (Malik et al, 2010). This is very alarming figure for the country like Pakistan where the gap between available doctors and required number of doctors to serve national demands is very wide. Along with that poor working conditions, heavy workload, paucity of time to fulfil personal and social commitments and lack of advancement are some of the other problems that medical professionals come across in Pakistan. Therefore, this study attempts to explore the factors which assist to enhance the motivational level among health care professionals (i.e. Doctors) to determine job satisfaction.

This study is supported on the grounds of the conceptual framework which has been actualised on the basis of equity theory of fairness and Maslow theory of hierarchy. In addition this study aimed to examine the employee job attitudes and motivation in public sector health care organisations (i.e. Public hospitals) of Pakistan. The environmental factors like wealth distribution, role of women in society, gender difference, tolerance for difference of opinion, and law order may have not been directly attached to predict employee job attitude and reaction to different aspects of
job. However, socio economic conditions, safety and security, and government structure are interlinked to predict attitude and behaviour.

To bring visible change in Pakistan and improve living standard of common men in Pakistan government has introduced plans called health for all (HFA) and national health policy in 2009. (Khan, 2006; Pakistan, 2009). This programme underlines the importance of effective health care system which is efficient, equitable and effective to ensure acceptable, easy to get to and inexpensive health services in Pakistan. Furthermore, this programme will encourage people and communities to enhance their health status and it will concentrate on considering social disparities and disparities in health.

This programme will also act upon fair, responsive, and pro poor scenario and thereby facilitating to poverty reduction (Ministry of health, 2009) Key challenges that national Pakistan health policy to bring reforms are

- Developing cost effective health services for poor and vulnerable
- Ensure quality healthcare at all levels of health service
- Take steps to save poor from calamitous health spending
- Improve the availability and motivation of healthcare workforce
- Ensure more and highly motivated females healthcare workforce
- Developing responsive and accountable healthcare system
- Ensure successful supervision and research in health and medicine
- Take steps for evidence dependent decision making policy in healthcare system at all levels.

This study has focused on the healthcare professionals (General physicians) working in public healthcare sector (General hospitals) in Pakistan. The sample of population included male and female medical officers working in district hospitals in Pakistan as general physicians. The information about targeted population was obtained from ministry of health and Directorate of health for different regions working under the control of central or provincial ministry of health in Pakistan. The research began with
the action of contacting the randomly selected sample to obtain their consent for participation in this study. The provision of confidentiality and privacy has also been communicated and aims as well as objectives of study were explained to the sample population. In next phase survey instrument having a copy of survey questionnaire and covering letter stating the aims and objectives of study prepared by supervisor of the study were passed on to the participants mostly through personal visits or by other resources. Later than two weeks time researcher approached respondents and requested them to participate and provide a response. This exercise was carried thrice to generate maximum response. However, after ten weeks time and three reminders, the individuals who did not response were not pressed upon and consequently excluded from prospective respondents of the study.

1.5 Research Method Followed In This Thesis

The aim of this thesis is to find out and observe employee job attitude predictors and employee personality disposition impact to determine employee job satisfaction in Pakistan. This study has been generated on the foundation of a literature review, conceptual framework basis. On the basis of conceptual framework hypotheses were developed related to the independent and dependent variables of the study. This study followed quantitative technique to gather for data collection and analysis. This thesis adopted Positivist paradigm which is well known as scientific and quantitative. Positivist paradigm applies deduction approach that involves hypotheses development by following careful literature review and theoretical framework development (Hussey & Hussey, 1997). This study adopted quantitative technique on basis of concrete reasons. Firstly this thesis is aiming to measure the relationships between predictors and endogenous variable. Secondly on the ontological basis this study is based on the realist position. Thirdly from epistemological perspective recognise the observable facts understanding about human behaviours with the help of objective values. Finally positivist paradigm supports and is linked with the specifics and source of social phenomena.
According to the sociological paradigm and organisational analysis quantitative research approach is appropriate to describe and calculate what happens in the society and world with the help of finding methods and relationships as well as their formation elements (Burrell et al, 1979). The method involving numbers in objective form and linked with statistical analysis method is recommended when the purpose of study is to accumulate the data related to occurrence of phenomena. Positivist approach is significantly related to develop consistent means to accumulate “facts” about society that can be afterwards examined to generate explanation regarding the social world process (Gilbert, 2001).

Quantitative method can be applied to get understanding of employee attitude and motivational behaviour with the help of objective values. This study by and large is quantitative to gather the data and examine the theories. Due to Deceptive nature of the study, researcher adopted quantitative technique and survey instrument for data (Creswell, 2003).

The literature of Human resources management and employee job attitude and empirical research work by many scholars have followed the quantitative approach to accumulate the data in job satisfaction domain to examine employee job attitude and behaviour. In this regard the study by Seo and colleagues (2004) in Korea from the sample of healthcare professionals by administrating survey questionnaire observe that environmental and psychological variables related to predict employee job satisfaction. Brenda et al (2006) collected the data from the sample of employee working in Australia in one central and three local government organisations with help of survey instrument and examined the impact of participation in decision making to predict employee job satisfaction. By using the survey questionnaire with the sample of 109 state government information technology employees, Reid et al, (2008) examined the employee job satisfaction and its predictors like goal setting, role ambiguity, task variety, intergroup conflict and interrole conflict and found the substantial impact of these factors to predict employee job satisfaction in public sector organisations. In a latest study by Smerek et al, (2007) by administrating survey instrument among non academic large research university in USA studies the employee job attitude and motivation regarding job satisfaction. Study discovered that
job satisfaction is very important for effectiveness and vitality of any organisation. In addition it is humanistic aspiration not only to progress the work life but also has impact on other outcomes such turn over and effectiveness.

The listed literature signifies the role of job satisfaction in any organisation to make it effective and service oriented. In particular reference to public organisations where working condition are different than private sector employee job satisfaction may have very vital role to the effectiveness of organisation despite financial constraints and less integrated information systems management across agencies (Reid et al, 2008). Keeping the research objective in view, the substantial number of researchers have followed the positivist research paradigm and used survey questionnaire instrument. According to the Creswell (2003) to measure and assess the job attitude and motivation data the survey questionnaire is suitable application. In the write-up of A to Z of social research by Miller and Brewer (2003) argues that in positivist method with support of questionnaire having likert scale assess and measure attitude. Likert scale choices given to respondents are helpful to get good reliability and number of options to respondents.

The purpose of this research deliberation is to recognize and observe the organisational work attributes and employee personality aspects that are concerned with employee job attitude and motivation to predict employee job satisfaction. This thesis followed a quantitative research technique based on positivist research paradigm that is one of significant approaches of research methodology in the field of Business management and Human resources management domain. This representation is aimed to understand the employees’ job attitude and behaviour in relation to their job satisfaction. A quantitative paradigm studies concentrate and revolve around the what, where and when query (Cress2003). Accordingly this research study specifically concentrates the following questions.
• What impact do the organisational work attributes factors have on employee job attitude to determine employee job satisfaction?

• What influence the employee personality disposition factors have on employee level of job satisfaction?

• What are the effects of employee job satisfaction in Healthcare public organisations?

The data analysis for main study was done in three phases. In initial phase, the multi scale items were examined and then refined with the help of quantitative data accumulated from sample population. In next phase researcher conducted scale validating exercise by applying confirmatory factor analysis (CFA). In the end and final phase, study hypotheses were examined by using structural equation modelling technique.

Prior to main data analysis researcher did a pre test pilot study exercise to find out the reliability of multi –item scale. Reliability of scales was determined by checking the cronbach’s Alpha coefficient in the pre test pilot of the study (Tabachnick, 2007; & Hair et al, 2006). In addition, the survey instrument reliability and validity was checked by using the exploratory factor analysis and confirmatory factor analysis as well. Composites validity, averaged variance extraction tests have been conducted to determine the construct validity of the survey instrument (Anderson et al, 1988). In the end the hypothetical relationships between constructs were analysed with help of structural equation modeling technique (Hair et al, 2006; & Chin, 1998).

Missing data, descriptive statistics and outlier detection, normality of the data, homoscedasticity linearity examination, reliability analysis and exploratory factor analysis test were administrated with applying statistical package for social sciences(SPSS) 15.0 version for the windows(Hair et al, 2006)
1.6 Contribution of this Thesis

The input of this work is based on the extensive theoretical framework development which analyse and asses the predictors that have impact on the employee job attitude and behaviour for job satisfaction in public sector health organisation of Pakistan. This is unique study in sense that the very limited number of studies have examined in the way organisational work attributes and personality disposition aspects interrelationship as have been proposed and examined as well have been empirically tested in this study. Previous studies have not examined the organisational work attributes such as organisational justice, training, teamwork and personality disposition aspects as it has been evaluated and examined in current study. This study frame a correlative and casual model based on Adams equity theory and Maslow theory of Hierarchical need and Herzberg two factor theory.

In this thesis an integrated model was developed which amalgamates the predictors that are concerned with organisational work environment and employee personality inclination/disposition in the organisation. The predictors such that procedural justice, job training, esprit de corps, working conditions, job clarity and employee personality aspects such as self efficacy belief, self esteem, and emotional stability level.

Second contribution of this thesis to the knowledge, according to the best of the understanding of researcher, is valuable data from the organisational perspective of Pakistan. Moreover, this thesis provides input to the very narrow knowledge base in perspective of job attitudes and motivation to predict employee job satisfaction from Pakistan. The correlative conceptual model was framed for this study on the basis of organisational work attributes and employee personality disposition to predict and examine employee job attitude and motivation.

Third this thesis is first study of its kind from Pakistan having such extensive integrated model to gather empirical evidence of healthcare public employees in Pakistan. No such other study that has collected data in context Pakistan to predict
healthcare professionals’ job satisfaction is available. The sample of this study consisted general physicians working in different government hospitals across Pakistan. The sample consisted representation from all over the Pakistan from 20 districts public healthcare hospitals across the Pakistan. The sample is considered as good demonstration of public healthcare organisations in Pakistan.

Fourth and foremost lead of this thesis relates the fact that it provides input and empirical evidence in the domain of job satisfaction from fairly unique cultural and socio economic context. In the most instances prior studies have examined employee job satisfaction in USA, Canada, Europe and Australia continent and this thesis is first serious and rigorous attempt to produce piece of knowledge regarding employee job satisfaction in perspective of Pakistan. This allows testing and ascertaining the wider validity and generality of findings obtained from empirical studies conducted in developed countries.

In final, the outcome of this thesis realises that organisational work attributes and employees personality disposition are related to employee job attitude and behaviour for employee job satisfaction in the context of healthcare professionals working in public health organisations of Pakistan. This is significant contribution in perspective of Pakistan organisation studies to further elaborate it.

1.7 Limitations Pertain to This Study

This study supplies in detailed evaluation of the construct of employee job satisfaction, its predictors, and its consequence in the context of public sector employees of developing country. Nonetheless, it is complicated to develop an empirical study which contains all inclusive predictors’ assessment of the phenomenon of employee job satisfaction. As a result, this empirical study has certain limitations like any other research study. First, this study provides empirical input only from healthcare sector. Therefore, results may not be fully applicable to other public sector organisations. Secondly, several predictors have been identified that affecting employee job satisfaction in the domain of job satisfaction, other predictors possibly could be applied and may have been varying effect. Finally this study
generated data based on the sample from country in south Asia, therefore may not
generalised to other developing and developed nations public employee context.

These limitations create definite possibilities for prospective research in context of
developing nations generally and specifically Pakistan in the domain of employee job
satisfaction to fill the dearth of studies. This also develops good opportunity for
prospective research to examine much desirable, but highly intangible theory of
employee job satisfaction.

Organisation of Thesis

This thesis is organised in following chapters

Chapter 1: Introduction

The first chapter of this thesis outlines the background, scope, and a general overview
of Pakistan Healthcare system. Chapter delineate aims and objectives of the study, the
context and respondent base of the study. In the end methods used in study and
contribution from this thesis related information is provided.

Chapter 2: Literature review

This chapter supplies information relevant to the existing literature in the domain of
employee job satisfaction, the impact of organisational work attribute, employee
psychological aspects and employee personal characteristics and their influence at
work place. This chapter discloses the extant literature in the domain of Human
resource management, Organisational psychology, and organisational studies. Prior
literature relevant to the employee job satisfaction predictors carefully reviewed and
finally a research void is identified and discussed.
Chapter 3: Conceptual framework

This chapter is designed to establish research hypotheses to examine organisational and personality disposition determinants to measure employee job satisfaction. In order to have effective hypotheses researcher amalgamate the organisational work attribute variables and employee psychological aspects and its influence on employee job attitude. This directed to the amplification of the research area and development of a conceptual framework for this study.

Chapter 4: Research Methodology

This chapter revolve around the methodology issues and methodology followed in this thesis. This involves discussion at length regarding empirical research methodology inclusive of data gathering and analysis procedure. It also elaborates data collection, sample selection, survey instrument development, measurement and pre-test piloting. Later on the information regarding reliability and validity is supplied. Onwards chapter discuss kind of data, analysis process, statistical techniques applied to examine the study variables. In the last ethical consideration matters are highlighted in order to ensure that data is bias free and can be considered fit for generalisability. Conclusion is also presented for this chapter.

Chapter 5: Pilot study

This chapter supplies information about the assessment of reliability of various scales used in this study.
Chapter 6: Main study analysis and findings
This chapter outlines the analysis of result generated from main data gathered through survey questionnaire. The chapter starts with data arrangement, screening of data, presentation of sample demography and onwards factor loading, exploratory factor and structural equation modelling information presented. The finally presents results of hypotheses examination and then conclusion is provided.

Chapter 7: Discussion of the Main Study
The arrangement of this chapter is in subsequent pattern. In start data entry and information is supplied, this proceeds to the next phase that relates to the review of the scale measurement applied in this thesis and their refinement. Onwards the outcome of all hypotheses are reviewed and contrasted with earlier empirical work in the domain of employee job satisfaction. Finally chapter gives conclusion information about overall outcome generated after data analysis for this thesis.

Chapter 8: conclusions
In this chapter researcher provides sum up information regarding the outcome of this empirical study. In beginning the theoretical contribution of this study is elaborated. Secondly researcher supplies information about managerial implication of this thesis. In next phase methodological and theoretical inadequacies are identified. In finishing phase future research avenues are discussed.
Chapter Two: Literature Review - Predictors of employee job satisfaction

Introduction

This chapter supplies a detailed view from the existing literature that elaborates factors which have a straight link to employee behaviour, motivation and job attitude to predict employee job satisfaction. Significantly, this in detail review emphasizes the actuality that employee job satisfaction is very crucial for dynamic workforce and implementation of effective and successful policies in any organization.

Job satisfaction is an elusive phenomenon since the inception of Maslow and Herzberg need theory in 1950. In the present era, the major issue confronting the organisation management is the implementation of practical effective human development strategies (Bhatti & Qureshi, 2007) such as working conditions, employee participation, opportunities for employees’ commitment and satisfaction with the job and/or organisation. It is commonly believed that the public sector employees are motivated by the sense of the service, which could be employee’s motivation to serve his/her community/nation. In this regard, public organisation’s mission often provides the employee a chance to his/her altruism fulfilled. Nevertheless, the fulfilment of employee’s altruistic needs does not mean employee’s satisfaction with his/her job in the public sector organisation, which is determined by some other factors.

The level of an employee’s satisfaction with her/her job can be judged by the degree of his/her productivity, retention with the job, absenteeism, grievance expression, tardiness, low morale and other factors. According to Rad and Yar Mohammadian (2006), employees whose are more productive and stay on job for longer periods represent their high level of job satisfaction. Corollary of low satisfaction with work can be more frequent absence from the work, low work performance and low quality of service, which might lead to work disruption, increase in administrative and training costs and reduction in the productivity (Abu-Bader, 2000). Dissatisfaction with job has been reported to be higher in employees who are working in public sector than in the private sector (Rainey, 1989; Steel and Warner, 1990; Baldwin and Farley, 1991). Therefore, the public sector organisations are looking for various
approaches required to enhance their employees’ satisfaction with the job, thus enhancement in their productivity; however, there is not much knowledge available about various issues involved in job satisfaction among public sector employees (Bradley and Brian, 2003). The Literature review exhibits an unambiguous and transparent perceptive of topic being researched, recognizes the contrasting opinion regarding research topic, illustrate suitable conclusion, and highlight the significance of research problem (Hart, 1998)

Careful review of literature pertaining to employee job satisfaction, organisational factors affecting employee job satisfaction, and role of employee personality disposition to predict job satisfaction are the themes of this chapter. Existing studies from the disciplines of organisational behaviour, Human resources management, and organisational psychology are examined by this chapter. This chapter starts with overview of concept of job satisfaction and its impact on employee and consequence of job satisfaction. Prior studies of job satisfaction are then reassessed and finally the research void is recognised and discussed.

2.0 Definitions of Job Satisfaction Overview

When examining job satisfaction, the first concern is the definition. In the precedent decades, several employee motivation and job attitude researchers have proposed different definitions of job satisfaction accordingly to their own perceptions, familiarity and understanding in studying this theme.

While, there has not been an agreed one; researchers tend to employ their own definition associated to factors in a specific perspective. However, the majority definitions are directly related with each other. The centre of them is the state when an individual has optimistic emotional response to a specific job.

Job satisfaction reveals how encouraging an individual’s attitudes is to their job and contemporaries, and how they recognise they correspond into and play role in the organisation. Job satisfaction is one of the widely used and examined notions on
Human resources management and Organizational Behaviour (OB). This segment supplies some of the generally applied definitions of job satisfaction which contributed the development of pertinent measurement scales and is used in the existing study.

Price (2001) describes Job satisfaction as affective orientation that an employees have towards their work. Job satisfaction is defined as an extent to which employee like their work. Agho et al, (1993) argue that Job satisfaction is an attitudinal variable which reveals how people feel about their job. It highlights the specific task environment where an employee performs his duties and reflects the more tangible aspects of work environment.

Mowday et al (1982) state Job satisfaction is essentially an affective (Feeling) response of individuals toward their work.

Job satisfaction is also defined as the attitude of workers toward the organisation, the job, their fellow workers, and other psychological objects in work environment. A positive attitude toward these factors show job satisfaction and vice versa. (Beer, 1964).Hop pock(1935) in the study of empirical examination of job attributes from the private and public sector managers suggest that job satisfaction is a mishmash of psychological , physiological, environmental circumstances which realises the individual to express the satisfaction with job

Arnold and Feldman (1986) supplied definition states job satisfaction as “the amounts of overall positive affect (feeling) which one has about his/her job” According to early organisation theorists like Abraham Maslow and Frederick Herzberg Job satisfaction is caused by individuals’ desire to fulfil personal needs that consists of intrinsic and extrinsic needs. Following this theme it might be argued that job satisfaction is determined by the degree to which job characteristics will fulfil employee/person needs (Ting, 1997).

Job satisfaction captures the feeling people have about themselves in relation to their job such as Job specific well-being (Noblet et al, 2005). Job satisfaction refers to an individual’s general attitude toward his or her job. A person with high level of
satisfaction towards his job holds positive attitudes toward the job, while a person who is dissatisfied with his or her job holds negative attitudes about the job. When people speak of employee attitudes they speak of job satisfaction (Robbins et al, 1997). Job satisfaction is as matter of fact is emotional attitude of an employee towards his job and general attitude towards job and its several aspects such as working conditions, fairness in procedures, relations with team members in organisation (James and Jones, 1980 & Knoop, 1995). Similar point of reference is provided by Armstrong (1996) in the hand book of personnel management and suggests that job satisfaction is feeling and attitude that individuals hold regarding job. Optimistic attitude of employee toward job signifies the job satisfaction, and unenthusiastic attitude towards job signifies the absence of job satisfaction. Cranny et al (1992) say that Job satisfaction is “an effective (that is emotional) reaction to one’s job, emerging from the incumbent’s evaluation of real outcomes with those that are aspired. Kuhlen (1963) suggest that Job satisfaction is about the individual equivalency of personal needs to the perceived potential of the occupation for satisfying those needs. Whereas, Worf (1970) say job satisfaction is measured with need fulfilment and ascertaining whether or not the job met the employees’ physical and psychological requirements at work place. Literature observed the employee satisfaction as the output that can be developed by the input of working environment. The congruence between individuals’ expectations and organisational environment contribute to employee job satisfaction (Katzel et al, 1961) whereas, Lawler and Porter (1967) argued that person’s attitude towards job determines job satisfaction. Positive attitude towards job portrays the job satisfaction and similarly the pessimistic attitude towards job represents the lower job satisfaction. Kreis and Brockpop (1986) defined job satisfaction as employees feeling related to self perception of needs realization through work. While, Linda (1997) elaborated job satisfaction as a state of human mind determined by the extent to which the employee perceives his needs being fulfilled. On the other hand Luthans (1998) states that job satisfaction is an emotional response from employee towards job which can not be seen and can only be inferred and furthermore how well the outcomes are compatible with employee expectations may assist to determine employee satisfaction. According to Sousa-Poza and Sousa-Poza job satisfaction is determined by the balance between inputs and out puts. According to them human has basic and universal needs and that, individual
needs are fulfilled in their current situation, and then that individual will be happy. Job satisfaction depends on balance between work role inputs (pain)- like education, working time, effort, and work out puts (pleasures) like wages, fringe benefits, status, task importance, working conditions, and intrinsic aspects of the job. If work outputs (pleasures) are relative to work role inputs (pains), then it is to be said that job satisfaction increases (Sousa-Poza, Sousa-Poza 2000). Kreitner and Kinicki in organisational behaviour (2006) visualised job satisfaction on the basis of imbalances between what is anticipated and what truly happens; execution of work values, equity of fairness of treatment; and dispositional (genetic) components inclusive of specific personality traits lead to job satisfaction.

2.1 Significance of Job Satisfaction

The importance of job satisfaction lies in its stabilising effects like reducing tardiness, absenteeism, and turnover and consequently these stabilising factors linked to employees’ performance. Hence it might be argued that job satisfaction has some kind of link to employees’ performance. Secondly job satisfaction mediates the effects of in role performance, role conflict and job related tension (stress).

In most instances it is true that satisfied employees are more productive, effective (helpful), efficient (good at job), and committed to their employers. Recent research data indicate the direct correlation between staff satisfaction and client satisfaction. Employers who create atmosphere which catch the attention of (attraction) of employees, motivate and retain hard working individuals and in result such employers will be better positioned in environment which demands quality and cost efficiency. Cost efficiency is an important factor because if costs are higher than benefits then in such circumstances no action will take place.

In addition, the employers by creating positive work place atmosphere not only increase their employees’ job satisfaction but their own satisfaction also. Professional and competent management means motivated and neutral employees working in system who are dedicated to serve the interest of public. In order to have professional management who is cost conscious it is imperative to study employee work related
well being and evolve strategies which abate to minimise employee job stress and enhance their job satisfaction. According to human relations theory the workers who are satisfied will automatically become effective and productive. However, the relationship between satisfaction and productivity has been acknowledged to be much more complex. Hence it is worth examining to know the potential effects of satisfaction.

- Research provides convincing evidence that job satisfaction helps to retain employees. Where the job satisfaction level is high labour turnover rate is low. However, there are many other factors are also involved that influence turn over intention of employees. It will be unwise to assume that satisfaction and employee turnover has direct relationship. Job satisfaction is probably one of those experiences of work that make it less likely that someone will think about quitting his/her job even if there are available opportunities, but if job satisfaction is absent and opportunities are there, employees turn over may increase.

- Better job satisfaction level also helps to reduce absenteeism propensity among employees. The effects of satisfaction on absenteeism seem to be much stronger. When job satisfaction level falls it is likely that absenteeism is to rise. Absenteeism is alternative to turn over in conditions where one has very few options of suitable job elsewhere. Therefore we can assume that satisfaction has similar influence on absenteeism as it has on employee turnover.

- It has been academically debated over a period of time among scholars whether satisfaction lead to high performance. Literature reveals satisfaction and performance has spurious relations.
2.2 Theories of Job satisfaction

In view of the fact that a variety of definitions of job satisfaction can be derived from diverse theories, there is a call for to examine supporting theories when researching this topic. Studies in job satisfaction domain has progressed from plain illustration of needs theories to more complex appraisal and exploration to conclude the source and consequence of job satisfaction. Consequently researcher has explored some of very prominent and significant theories of employee job satisfaction as follow.
<table>
<thead>
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<th>Name of theory</th>
<th>Features</th>
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| Herzberg 2-factor theory               | **Motivator Needs:** Based on two factors of Motivator needs and hygiene needs. Manifest job content and higher order needs such as; achievement, advancement, growth, recognition, and responsibility. Positive job prospects allow employees to fulfil their motivator needs. Consequently, employees report Job satisfaction.  
**Hygiene needs:** Represent job context and lower order needs such as; policies, working conditions, security, status, leadership style. Absence of proper provision for employee lower order needs impacts on the level of job dissatisfaction. | Adapted from Buchanan & Huczynski, 2004, p-260.                                              |
| Maslow’s Hierarchy Needs Theory        | **Lower order needs:** Characterise by two features called lower order and higher order needs. Include physiological needs, safety/security, belong and affection needs. **Higher order needs:** Represent achievement, self esteem, spiritual or cosmic needs, and self actualisation. Maslow differentiated between lower-order and higher-order needs and acknowledged that each person has a specific array of needs. The physiological, protection/wellbeing, belonging and affection needs are described as lower-order needs and accomplishment and esteem, and self-actualisation needs as higher order needs. The delineation between the two orders that higher order needs are fulfilled internally but lower order needs are contented with help of external sources. These all needs are hierarchical in character, in the substance that, in order for the fulfilment of higher level, the lower level needs must firstly be met. Simply if one need is satisfied, then another emerges. | Adapted from Maslow, 1943, pp-370-396; Buchanan & Huczynski, 2004, p-246.                      |
| Hackman & Oldham Job Characteristics Theory | **Job dimensions:** Is skill variety, task significance, task identity, autonomy, and feedback. **Psychological states:** such as experiencing meaningfulness of work, responsibility for outcome of work and knowledge of prospective result of work. | Adapted from Buchanan & Huczynski, 2004, p-262.                                              |
| Adam’s Theory of Equity                | Three key features focused in this theory which is Inputs, outcome, and referent to influence job satisfaction. Inputs represent what person brings to job like age, education, skills. Outcomes are rewards which one expects to get as result of work. Referent is comparison for person with others. According to Adams, people are encouraged to keep up fair relationships between inputs and outcomes. He said that inequity forms for a person whenever he observes that the ratio of his rewards to inputs and the share of other's rewards to other's contributions are not the same. Equity theory simplifies the motivational issues by not explicitly considering distinctive needs, values, or personalities. | Adapted from Adams, 1963                                                                     |
| Expectancy Theory of Motivation        | **Perceived effort-reward:** Probability; The Probabilities that incentives depend upon accomplishments and accomplishment's depend upon effort. **Value of reward:** desired results individuals expect to accomplish from job. **Observed equity reward:** The rewards which people sense are equitable. | Adapted Vroom, 1964                                                                         |
2.2.1 Frederick Herzberg two factor Theory

This theory is simple structured plan to motivate employees to increase their job satisfaction. Herzberg an American behavioural scientist suggested that people could display their dissatisfaction about salary, job security, supervisor behaviour, and company policy. However, if these issues were resolved, it did not guarantee job satisfaction. He categorized achievement, recognition, and growth as antecedents of job satisfaction. Herzberg named dissatisfies as “Hygiene factors” because they assist to prevent employees’ dissatisfaction, but in themselves they would never provide real satisfaction. Possibly one has good salary and secure job but there’s something lacking. You are not dissatisfied with your work, but you are not satisfied either. According to Herzberg key to job satisfaction is having one or more motivating factors (achievement, growth, and recognition) present. Support for Herzberg two- factory theory has been mixed. The independent effect of motivators and hygiene factors has been inconclusive. Herzberg (1968) theory of motivation supplies two reasons phenomenon regarding two factors which were identified as Motivators and Hygiene factors. The Herzberg suggested that factors which support employee job satisfaction are distinct from the factors that may cause employee job dissatisfaction. According to Herzberg theory (1959) motivational factors are intrinsic and emanate from the content of the job such as recognition, work itself, advancement, responsibility, achievement and advancement and alike. Whereas hygiene factors relates to the context of the job such as working conditions, organisational policies, management, leadership, and relationship in organisations within teams. The distinct point of Herzberg two factor theory is that it stated that job satisfaction and job dissatisfaction are not contradictory to each other but two different aspects of employee motivation. Herzberg argued that reverse of job satisfaction is not job satisfaction however, it is no job satisfaction. In same line of action the opposite job dissatisfaction cannot considered as job satisfaction rather be considered as absence of job dissatisfaction Herzberg theory suggests that human being mainly two types need. One is to keep self protected and avoid and second need is to advance psychologically (Lundberg et al, 2009). In fact these two factors are basis of two factors Herzberg theory of motivation (House & Wigdor, 1967). These are
separate sets of human needs and have impact on employee level of motivation. One set of needs consists of basic needs of human survival are called hygiene factors. These needs have not direct linkage to job but related with the working conditions, organisational policies and relationship in organisation among employees. Herzberg argued that these factor if not fulfilled may cause job dissatisfaction, however, fulfilment and satisfaction with these may necessarily cause satisfaction but can only avoid dissatisfaction. On other hand second set of needs consists of growth needs such as recognition, achievement, and advancement alike. Herzberg suggested that absence of growth factors do not result in any dissatisfaction, however, employees express absence of job satisfaction (Lundberg et al, 2009; Wright, 1989; & Tietjen & Myers, 1988).

Figure 1    Herzberg Theory Hygiene Factors

Source: Developed for this study, 2011
2.2.2 Maslow’s Hierarchy Needs Theory

Maslow theory suggests that there is hierarchy of needs up which people to progress. This hierarchy of needs revolve around lower and higher order needs. Once individuals satisfy a need at one level in hierarchy this cease to motivate their behaviour; instead they are motivated by some other need at next level up the hierarchy. In consequence at first individuals are motivated by physiological needs like hunger and thirst. When physiological needs are satisfied, security needs like shelter and protection becomes major influence on individual’s behaviour. Conducive environment lets an individual to progress from behaviour activated by these deficiency needs to behaviour which reflect what Maslow termed as higher order needs. This progression from deficiency needs to higher order needs ultimately leads to behaviour motivated primarily by the need to realise one’s full potential and fulfilling psychological needs, which Maslow termed the need for self actualisation (Maslow, 1954). Maslow, however, believed that because of the uneven distribution
of satisfying work only a small proportion of the population reach this level. Therefore, self actualisation is for most of us a need which will motivate our behaviour throughout our lives. Maslow theory though their long times relevance in employee motivation have its own weakness as well. According to Buchanan & Huczynski, (2004) this theory has vague concepts and unable to readily determine individual behaviour and second this theory is culture dependent. Despite of deficiencies, Maslow theory of hierarchal needs can be not dismissed to be irrelevant to employee motivation in twenty first century. This theory still relevant and important because ideas provided in the theory of Hierarchal needs may affect range of motives. It particularly supplies substantial information to the organisational managers to understand the employees need and has appropriate framework to determine the numerous needs and expectation that employees have in respect of their jobs and organisations (Mullins, 1996; Berry, 1998; Buchanan & Huczynski, 2004).

![Needs Hierarchy](image)

**Figure 3 Needs Hierarchy**

*Source: Developed for this study, 2011*
2.2.3 Hackman & Oldham Theory of Job Characteristics

According to this theory predictors of job satisfaction are to be found in the objective characteristics of a job. This has been first outlined in 1975 by Hackman and Oldham (Hackman & Oldham, 1975) and this theory attempted to transform the lazy, barren workforce into spontaneous, energetic and efficient workers.

The key concepts of model that has been presented by them still provide the foundation of many job satisfaction and job characteristics studies. The Hackman and Oldham job characteristics model is mix of content and process models of motivation. The Hackman and Oldham job characteristics model originates dates back from the work of Arthur and Paul (1965) which assessed the link between employees reaction to their work and particular objective attributes of work.
Hackman & Oldham say jobs vary to the extent that they involve five core dimensions namely skill variety, task identity, task significance, autonomy, task feedback. It has been argued by them that proximity of five core dimensions will emerge three psychological states in employees which are meaningfulness of work, responsibility for work outcomes, and knowledge of results of work activities. The Job characteristics theory suggested that routine work and non challenging jobs lead to lethargy, high employee dissatisfaction, to withdrawal behaviour, absenteeism and eventually hardship in successfully dealing with employees who work on simplified work.

2.2.4 Hackman & Oldham Job Characteristics Theory

Hackman and Oldham model of job characteristics assume specific key conditions; first, employee must be aware of the result and should have knowledge of his or her work; secondly employee must feel responsibility and feel obliged to take up the responsibility for the outcome regarding work, the employee must acknowledge the work as having an important effect or meaningfulness to himself. This model further suggested that employee realises positive effect to the level that he or she gains knowledge of task and feels responsibility personally for the job performed and cares about it by recognizing meaningfulness for the job performed. The Hackman and Oldham model identified five core job aspects (Table 1.) and which generate three psychological conditions (table2) (Hackman & Oldham, 1975-76), that revolves around numerous individual and work related motivational outcomes.
<table>
<thead>
<tr>
<th>Skill variety</th>
<th>The extent to which job provide opportunity to an employee to use of a number of different skills and talents</th>
</tr>
</thead>
<tbody>
<tr>
<td>Task identity</td>
<td>The extent to which an employee require the completion of a whole, identifiable piece of work.</td>
</tr>
<tr>
<td>Task significance</td>
<td>The degree of impact job performed by employees are believed to have on other people inside and outside the organisation they are situated in</td>
</tr>
<tr>
<td>Autonomy</td>
<td>The extent of freedom, independence, and discretion provided by job in determining things like workplace, work breaks, and allocation of tasks.</td>
</tr>
<tr>
<td>Task feedback</td>
<td>The extent to which job provide clear and direct information to employees about the effectiveness of performance.</td>
</tr>
</tbody>
</table>

Table 1  Core Job Dimensions

<table>
<thead>
<tr>
<th>Psychological State</th>
<th>Determinants</th>
</tr>
</thead>
<tbody>
<tr>
<td>Experience meaningfulness of work</td>
<td>Level of skill variety, task identity, and task significance.</td>
</tr>
<tr>
<td>Experienced responsibility for work outcomes</td>
<td>Amount of autonomy involved in job</td>
</tr>
<tr>
<td>Knowledge of results of work activities</td>
<td>The amount of feedback given by job.</td>
</tr>
</tbody>
</table>

Table 2  Three Psychological States
The critics of this theory argued that employee self reports are solely applied as instrument to assess both job characteristics and outcome. Therefore, the information supplied by job holder may not be the objective job conditions. It is might be possible that employee self reported job characteristics may have been influenced by the level of job satisfaction (Adler et al, 1985). In addition applying self reports as indicator to predict objective environment is often unsuitable (Spector & Jex, 1991; Taber & Taylor, 1990). In spite of inconsistencies the theory of job characteristics is relevant to determine employee motivation and satisfaction at work place. Job might be influenced by job characteristics. Job satisfaction might be enhanced by enlarging the job as suggested by job characteristics model. It is also worth mentioning that job characteristics could be reformed to enhance employee job satisfaction (Buchanan & Huczynski, 2004).

2.2.5 Adam’s Theory of Equity

Theory of equity is named for John Stacey Adams a work place and behavioural psychologist. He developed the equity theory of job motivation in 1963(Adams, 1963). Equity theory suggest that employees in any organisation not only stimulated for effectiveness when their need are recognised but they also desire for fair reward system in employment (Buchanan & Huczynski, 2004).

Equity theory assumes that one important cognitive process involve people looking around and observing what effort other people are putting into their work and what rewards follow for them, and comparing this ratio with their own. Individuals can also compare their effort –reward ratio to one which they experienced at another point in time. Equity theorists assume that social comparison process is driven by our concern with fairness or equity. We perceive effort and reward not in absolute but in relative terms. When people perceive others are enjoying similar ratio of inputs (effort, qualification, skill level, and seniority) to outcomes (pay, advancement, fringe benefits) to themselves, they experience equity. When people observe a ratio of inputs to outcomes that either favours other people or themselves they experience
inequity, which is assumed to be enough unpleasant experience to motivate changes in either behaviour or perception, or both (Buchanan & Huczynski, 2004).

<table>
<thead>
<tr>
<th>Myself</th>
<th>Yourself</th>
</tr>
</thead>
<tbody>
<tr>
<td>Inputs(100)</td>
<td>inputs(100)</td>
</tr>
<tr>
<td>Outcomes(100)</td>
<td>Outcomes(100)</td>
</tr>
<tr>
<td>EQUITY</td>
<td>EQUITY</td>
</tr>
<tr>
<td></td>
<td></td>
</tr>
<tr>
<td>inputs(100)</td>
<td>inputs(100)</td>
</tr>
<tr>
<td>Outcomes (100)</td>
<td>Outcomes (125)</td>
</tr>
<tr>
<td>Inequity (underpayment)</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
</tr>
<tr>
<td>inputs(100)</td>
<td>inputs(100)</td>
</tr>
<tr>
<td>Outcomes (125)</td>
<td>Outcomes (100)</td>
</tr>
<tr>
<td>Inequity</td>
<td></td>
</tr>
</tbody>
</table>

Table 3 – Equity perception

The theory of equity is based upon inputs and outputs. Here is the list the few typical inputs and outputs Adams, 1963)

### 2.2.6 Inputs

<table>
<thead>
<tr>
<th>Efforts</th>
<th>Loyalty</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hard work</td>
<td>Commitment</td>
</tr>
<tr>
<td>Skill</td>
<td>Ability</td>
</tr>
<tr>
<td>Adaptability</td>
<td>Flexibility</td>
</tr>
<tr>
<td>Tolerance</td>
<td>Determination</td>
</tr>
<tr>
<td>Enthusiasm</td>
<td>Trust in superior</td>
</tr>
<tr>
<td>Support of Colleagues</td>
<td>Personal Sacrifice</td>
</tr>
</tbody>
</table>

Table 4 – Employee inputs
2.2.7 Outputs

<table>
<thead>
<tr>
<th>Inputs</th>
<th>Outputs</th>
</tr>
</thead>
<tbody>
<tr>
<td>Employee inputs:</td>
<td></td>
</tr>
<tr>
<td>Personal sacrifice,</td>
<td>Benefits /Promotions</td>
</tr>
<tr>
<td>Effort,</td>
<td></td>
</tr>
<tr>
<td>Tolerance,</td>
<td></td>
</tr>
<tr>
<td>Flexibility,</td>
<td></td>
</tr>
<tr>
<td>Reliability,</td>
<td></td>
</tr>
<tr>
<td>Loyalty,</td>
<td></td>
</tr>
<tr>
<td>Time</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>What employee gets from</td>
</tr>
<tr>
<td></td>
<td>inputs?</td>
</tr>
<tr>
<td></td>
<td>Enjoyment</td>
</tr>
<tr>
<td></td>
<td>Reputation</td>
</tr>
<tr>
<td></td>
<td>Praise</td>
</tr>
<tr>
<td></td>
<td>Responsibility</td>
</tr>
<tr>
<td></td>
<td>Recognition</td>
</tr>
<tr>
<td></td>
<td>Benefits</td>
</tr>
<tr>
<td></td>
<td>Security</td>
</tr>
<tr>
<td></td>
<td>Development</td>
</tr>
</tbody>
</table>

Table 5-Output generated through inputs (Buchanan & Huczynski, 2004).

Adams theory of equity Model of Inputs and outputs to measure employee motivation model

Figure 5: Developed for Predictors of employee job satisfaction by (Researcher, 2011).
Prior literature supports the applicability of this theory in the context of employee job attitude and behaviour to predict employee job satisfaction (Buchanan & Huczynski, 2004). Nemours empirical studies in organisational work settings confirmed equity theory and reported that perceived equity seems to lead and helping shape employee job satisfaction (Sweeney et al, 1990; Lambert et al, 2009; Mcfarlin et al, 1992).

2.2.8 Expectancy Theory of Motivation

The expectancy theory suggests and explains the process though which it becomes possible to explain desirable outcomes. Expectancy theory of motivation is cognitive process theory and developed by United States Psychologist named Vroom, V.H. in 1964. This theory is based on the point of view that Individuals preference of the kind of behaviour and attitude bring them an elevated reward of contentment or the least negative outcome of job dissatisfaction. It supplies an approach to assess how much effort individual has to exert into performing a job (Vroom, 1964). In this theory a formula was suggested by Vroom to determine individuals’ motivational strength. This theory explains process which individual uses to make choice regarding a variety of behavioural options. Three distinct perception; expectancy, instrumentality, and valance act as motivation for behaviour and suggest alternative behaviours (Chiang et al, 2008). Later in 1968 Porter and Lawler further developed and redefined the earlier Vroom’s theory of expectancy and produced a new model. The refined model by Porter and Lawler (1968) suggested that if employees contend with rewards then those rewards can be considered as valuable rewards and such rewards will motivate employee high performance. Furthermore, if employees develop perception that increased effort (input) will get them enhanced reward; the employees will exert added efforts. In this way employees develop expectation and which is linked to overall job satisfaction. The difference between all those rewards which an employee believes he should have and what in real an employee gets from job determines his or her overall job satisfaction (Evans, 1998). The relationship between expectations, in terms of what should be received, and perception of, what should expected determines employee job satisfaction. When the level of rewards received is equal to the expected rewards that brings enhanced satisfaction with job and when employees get less than
they hope it causes them experience dissatisfaction and absence of satisfaction (Porter & Lawler, 1968; Mullins, 2007).

2.3 Job satisfaction Related Factors

The number of theories that have discussed so far in this chapter supplies different perspective and approach to the phenomenon of job satisfaction. Porter and Lawler (1968) suggested a comprehensive model comprising the factors of other theories of motivation and act as representative of several job satisfaction factors. The purpose to illustrate all these theories in chapter is that they are highly linked to employee job satisfaction and also basis for this study. This supplied foundation to analyse the predictors to determine employee job attitude and behaviour to job satisfaction. As earlier mentioned that since all these theories have been developed and examined in highly industrialised work context and have US and western origin. Hence these theories do not supply explanation of motivation for non western work context. As a result this study has realised the need to examine and test the usefulness, applicability and generalisability of western motivation theories in perspective of work organisations in Pakistan.

In order to gain the profound understanding of employee job satisfaction this study anticipates viewing at some of important variables related to employee job satisfaction. The focus of this study is general physicians (GP’s) in public hospitals, however, literature on job satisfaction in general is very much relevant as it has straight link to understand and examine the factors of employee job satisfaction. Hence researcher presented an over view of categories and factors which are explored to understand the employee job satisfaction. Many researchers have made employee job attitude the focal point of analysis for the success of organisational effectiveness and individuals contentment (Mark et al., 2001). Numerous predictors like Organisational justice, promotion and advancement, team spirit, Job training, organisational policies, Knowledge management Working conditions, and employee personality disposition have been discovered to be related to employee job satisfaction (Elish et al., 2009; Adams et al., 2000; Vitell et al., 2008; Harter et al.,
These predictors can be classified by individual, psychological, workplace, environmental, and societal factors. However, researcher classified these factors into two main categories (organisational, and personality aspects factors) (Table-6). Judge et al.(2008), Ting(1997) and Ellickson etal (2001) have supported that extent of certain organisational and personality attributes may lead to the development of a positive job attitude and behaviour towards job satisfaction.
### Table-6 Taxonomy of employee job satisfaction factors

<table>
<thead>
<tr>
<th>Category</th>
<th>Factor(s)</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Organisational Factors</strong></td>
<td>Organisational justice</td>
<td>Elish et al (2009); Chu et al (2003);</td>
</tr>
<tr>
<td></td>
<td>Promotion and advancement</td>
<td>Shah &amp; Jalees (2004); Adams et al (2000); Ellickson et al (2001); Ting (1997)</td>
</tr>
<tr>
<td></td>
<td>Professional status and organisational policies</td>
<td>Maureen et al (2006); Rad et al (2006)</td>
</tr>
<tr>
<td></td>
<td>Adequate work equipment/ resource and opportunities for training</td>
<td>Ellickson et al (2001); Harter et al (2002); Schmidt (2007)</td>
</tr>
<tr>
<td></td>
<td>Procedural constraints and goal clarity</td>
<td>Bright Bradley (2003); Brunetto &amp; Farr (2002); Ting (1997)</td>
</tr>
<tr>
<td></td>
<td>Standard working conditions</td>
<td>Bader (2000); Sui (2002); Lederer et al (2006); Yusu haru et al (2009)</td>
</tr>
<tr>
<td></td>
<td>Task significance</td>
<td>Ting (1997); Campion et al (1993); Rousseau (1977)</td>
</tr>
<tr>
<td><strong>Personality aspects</strong></td>
<td>Self Esteem</td>
<td>Donald &amp; Jon (1998); Pierce et al (1989); Jude &amp; Bono (2001); Chang et al (2010)</td>
</tr>
<tr>
<td></td>
<td>Self Actualisation</td>
<td>Lawler &amp; Porter (1967); Maarten et al (2007); Mullins (2007)</td>
</tr>
<tr>
<td><strong>Demography</strong></td>
<td>Age</td>
<td>Glenn et al (1997); Mrayyan (2005); Sengin (2003)</td>
</tr>
<tr>
<td></td>
<td>Sex</td>
<td>Sloane &amp; Williams (1996); Ward &amp; Sloane (1998); Jung et al (2007)</td>
</tr>
<tr>
<td></td>
<td>Length of service</td>
<td>Oshagbemi (2000); Cooper &amp; Kelly (1993)</td>
</tr>
<tr>
<td></td>
<td>Qualification</td>
<td>Jules and Christopher (2009); Ward &amp; Sloane (1998)</td>
</tr>
</tbody>
</table>
Abundant literature is available in the domain of employee job satisfaction highlighting the relationship of organisational attributes and personality aspects to determine employee job satisfaction (Chu et al, 2003; Tanja et al, 2003; Lu et al, 2005; Ellickson et al, 2001; Bradley et al, 2003; Judge et al, 1998; Adams et al, 2000). Indeed, organisational attributes are related to environment and policies existing in organisation such as fairness in procedures, team work, job trainings to make employee skills update, job clarity, standard working conditions, and policies to make employee work meaningful (Ting, 1997; Niehoff et al, 1993; Bader, 2000; Noblet et al, 2005; Castle et al, 2005; Maureen et al, 2006). These organisational attributes significantly influence employee motivation and behaviour to predict and determine job satisfaction. Similarly another equally important aspect to understand employee job satisfaction is employee personality aspects and personal characteristics. Literature suggests that personality disposition contributes to a much extent to predict employee job satisfaction (Watson et al, 1988; Arvey et al, 1989; Heller et al, 2009; Srivastava etal, 2010). In reality personality aspects and individual personal characteristics are linked with personal and psychological aspects of individual employees such as self esteem, employee self efficacy belief, demography, positive affectivity, locus of control, self actualisation and neuroticism (Furnham & Zacherl; Joyce et al, 1986; Glenn et al, 1997; Sawada et al, 2004;Johnson et al, 2008; Jules & Christopher, 2009).

In the domain of job satisfaction research over the period of time several empirical studies have found the considerable link between personality variables such as self esteem (Judge et al, 1998; Donald et al, 1998; Tomoki et al, 2008), Self efficacy belief (Bandura, 1992; Chen et al, 2000), Locus of control (Judge etal, 1998; Cummins, 1989), and neuroticism (Heller et al, 2009; Miller et al, 2009; & Srivastava et al; 2010). The empirical outcome generated through these studies proposes that employee personality aspect play a considerable role in determining employee job attitude and behaviour for job satisfaction.

Hence along with organisational work attributes, employee personality aspects also need be to be taken in consideration when determining and predicting the sources of job satisfaction.
All these organisational work attributes related factors and employee personality factors have been observed with diverse relationships and proportions and established prospective outcome to determine employee job attitude and behaviour for job satisfaction. After carefully carried comprehensive literature review this study emerged to concentrate and examine more vigorously to employee job satisfaction determinants relating to organisational work attributes and employee personality factors (Figure 5). The organisational attributes factors and employee personality disposition aspects may assist to build up positive and conducive environment to enhance employee job satisfaction and consequently have effective and vibrant workforce in organisation.
Figure 6 Employee job satisfaction Predictors
2.4 Organisational attributes based predictors of Employee Job satisfaction

Job satisfaction need for effective and dynamic workforce and efficient service for end users is highly recognised over the period of time. In last few decades considerable research work has been carried in the domain of employee job satisfaction (Aasland et al., 2010; Gardulf et al., 2008; Castle et al., 2006; Behn, 1995). Several aspects of employee job satisfaction have been taken into consideration and examined with help of numerous theorise, models and empirical outputs by the researchers. The literature with empirical discovery suggest that organisational work attributes such as justice, team work, training, standard working conditions, job clarity and employee personality disposition such that self esteem, employee self efficacy belief, locus of control, neuroticism and affectivity (Figure 5) have substantial role to predict employee job satisfaction (Boyt et al., 2001; Bradley et al., 2003; Chu et al., 2003 Chen et al., 2001; Chnag et al., 2010; Constantine et al., 2008; Cropaanzano et al., 1993). Therefore researcher has supplied considerable number studies related with organisational work attributes based predictors in following section. This segment will examine studies related with under mentioned organisational attributes’ relationship with job satisfaction.

- Procedural Justice- Perception of fairness in relation to rewards and procedures.
- Job training- Set of designed activities to increase job knowledge and skills
- Working conditions- Physical environment and degree of comfort at work place.
- Esprit de corps (Team spirit)- Individuals belief to act as team in organisation
- Job clarity- employees’ precision concerning their role and expectation in organisation.
- Task significance- meaningfulness and impact of work in and outside organisation.

Whereas, the personality aspects role to determine the employee job satisfaction is explored in section (2.5) with considerable deliberation.

In the domain of employee job satisfaction literature employee job attitude and motivation considered to be based on two fundamentals such that organisational work attributes and employee personality disposition. According to Judge etal (2008) employee do not essentially enjoy work and predict job satisfaction on the basis of
work attributes and job aspects only but it also involves the employee personality disposition as well. Numerous studies suggest that people own a mental frame of disposition such as value, esteem, attitudes, that are established over period of time and moderate their behaviour when they are engage in work at any organisation (Judge et al, 1998; Noryati et al, 2009; Joyce et al, 2003). Hence, it is necessary to take into account the personality aspects along with job attributes to predict employee job attitude and behaviour for job satisfaction. In literature employee job satisfaction broadly viewed from two major perspectives such employee affective reaction to organisational work attributes and employee personality disposition. In employee effective reaction to work attributes, an employee reaction based on appraisal of organisational work attributes as pleasurable or unpleasurable for the attainment of employee work values (Howard, 2002). Whereas, employee personality disposition reflect the overall value an employee places oneself as person, employee estimates as a person having mental strength to manage, execute, and be successful, internal belief in one self that wide range of affairs in one’s life is controlled by him or herself, and finally this trait exhibits the tendency to be confident, secure, and steady (Judge & Bono, 2001). From organisational work attributes based perspective in study of procedural Justice Moorman et al (1993) argued that procedural justice in terms of its impact on employee work attitude significantly determine job belief and identified that employees’ evaluation regarding fairness or unfairness of procedures considerably impact on the development of their job satisfaction level. By adopting the theoretical basis, Folger et al (1989), as set out by Lind and Tyler (1988), recommend that allowing employees two way communication; employees having chance to give their view and supervisors allowing employees to provide input before making any decision considerably impact on employee job attitude.

Ling (2008) administrated survey questionnaire to Information technology professionals. The sample of 210 respondents reported positive and considerable impact of job characteristics such that task significance, autonomy, and feedback along personality disposition to predict employee job satisfaction.

Maureen et al (2006) revealed significant link between professional status, interaction, and job satisfaction from the sample of health care employee in Canada. The findings also identified that policies such as procedural justice or fairness, leadership style have also contribute to determine employee job satisfaction.
Ellickson et al (2001) concentrated on organisational work attributes factors like feeling of pride to work with organisation, promotional policies existing in organisation, sufficient work resources, and even-handed work load. By administrating survey questionnaire among employees in municipal work organisation authors found the significant impact of above stated organisational work attributes to determine employee job satisfaction. However, esprit de corps or team work was found to be strongest factor of employee job satisfaction.
### 2.4.1- Literature Review

<table>
<thead>
<tr>
<th>Reference &amp; Location</th>
<th>Research frame work and design</th>
<th>Publisher</th>
<th>Key outcome</th>
</tr>
</thead>
<tbody>
<tr>
<td>Moorman et al(1993)</td>
<td>Questionnaire survey instrument 1500 Employees including 230 Managers who are immediate supervisors of 1500 employees</td>
<td>Employee Responsibilities and Rights Journal. Vol(03);pp 209-225</td>
<td>Self interest and Group value model theory supports the perception of procedural justice to employee job satisfaction and suggest the fairness and justice role in organisation to predict employee work behaviour</td>
</tr>
<tr>
<td>Tanja, S.; Emilye, H(2003)</td>
<td>Survey administrated among 1003 teachers, 128 principals, and 100 village leaders.</td>
<td>International sociology association research committee on social stratification and mobility</td>
<td>Physical conditions of infrastructure, involvement in work, scarcity of daily use necessities, and absence of recreational activities are negatively and positively correlated with employee job satisfaction.</td>
</tr>
<tr>
<td>Ellickson &amp; Logsdon(2001)</td>
<td>Survey method applied with 1227 municipal employees</td>
<td>State and Local Government Review Vol(33):3;pp-173-184</td>
<td>Empirical analysis suggests that work attributes such that availability of resources, training, quality of leadership and most crucially esprit de corps significantly determine job satisfaction.</td>
</tr>
<tr>
<td>Abu-Bader(2000)</td>
<td>Among the 400 social workers survey questionnaire distributed</td>
<td>International journal of social welfare Vol(09);pp-191-200</td>
<td>Comfort at work, membership among majority group, clarity of job and level of education significantly impact on employee job satisfaction level</td>
</tr>
<tr>
<td>Reference &amp; Location</td>
<td>Research frame work and design</td>
<td>Publisher</td>
<td>Key outcome</td>
</tr>
<tr>
<td>----------------------</td>
<td>-------------------------------</td>
<td>------------</td>
<td>-------------</td>
</tr>
<tr>
<td>Bradley &amp; Brian(2003) USA</td>
<td>385 sample of New York state employee participated in study and supplied information through questionnaire</td>
<td>The American Review of Public Administration Vol(33):1;pp-70-90</td>
<td>Clear strategies that address employee needs help to have positive and considerable impact on employee job satisfaction.</td>
</tr>
<tr>
<td>Maureen &amp; Norma(2006) Canada</td>
<td>The survey questionnaire, the index of work life satisfaction designed and given out to measure the magnitude of job satisfaction</td>
<td>Public health nursing Vol(23):3;pp-250-255</td>
<td>Organisational policies, autonomy, professional status, and task requirements are significant predictors of job satisfaction for public sector health care professionals in Canada.</td>
</tr>
<tr>
<td>Price.(2002) England</td>
<td>Sample of 141 health care service providers supplied information through Questionnaire instrument</td>
<td>British Journal of Nursing Vol(11):4;pp-275-280</td>
<td>Team work and relationships within organisation among employees, amount of control , and professional responsibilities were found to be detrimental to job satisfaction</td>
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<tr>
<td>Reference &amp; Location</td>
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<td>Adamson et al (1995)</td>
<td>Sample of 242 healthcare professionals were given questionnaire to obtain information regarding job satisfaction</td>
<td>Journal of advanced nursing Vol(21):pp,172-183</td>
<td>Working conditions, perception of professional status, and relationship with administration significantly impact on job satisfaction level.</td>
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<td>Australia &amp; England</td>
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<td>Sindh(Pakistan)</td>
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<tr>
<td>Ting (1997)</td>
<td>567 Randomly selected federal government employee participated in study and filled questionnaire survey</td>
<td>American review of Public administration Vol(26):4:pp,439-456</td>
<td>Clarity of assigned, meaningful or significance of job, demography, skill utilisation are strongest predictors of state employee job satisfaction in USA</td>
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<td>USA</td>
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<tr>
<td>Susan (2003)</td>
<td>1200 randomly chosen worker were administrated survey instrument</td>
<td>International Journal of Manpower Vol(24):6:pp, 626-652</td>
<td>Intrinsic attributes like feeling good, skills development, training and learning, freedom to perform task and extrinsic attributes like job security, respect, and promotion policies contribute to employee job satisfaction. However, demography has very negligible impact on work attitude in Russia</td>
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<td>Russia</td>
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<td>Adler(1980) Tel Aviv (Israel)</td>
<td>110 employees were given survey to measure self esteem and job satisfaction relationship</td>
<td>Journal of Applied psychology Vol(65):3;pp,327-332</td>
<td>Empirical analysis indicates that along with external agents such as co-workers and superior, internal personality disposition such as self esteem may also contribute to employee job satisfaction</td>
</tr>
<tr>
<td>Chu et al(2003) Taiwan</td>
<td>308 health care providing professionals supplied questionnaire based information</td>
<td>International Nursing review Vol(50);pp,176-182</td>
<td>Different management styles or reward systems and employee personality disposition strongly predict job satisfaction.</td>
</tr>
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<td>Donald et al(1998) USA</td>
<td>186 professionals and 22 of their supervisors working in mid western US electrical utility filled the survey questionnaire</td>
<td>Group and organisation management Vol(23):1;pp,48-70</td>
<td>An empirical examination explored and identified the significant role of self esteem and self efficacy to predict employee job related affect (job satisfaction).</td>
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<tr>
<td>Firth et al(2004) Australia</td>
<td>A questionnaire survey filled up by 173 salespeople from clothing of large departmental store</td>
<td>Journal of managerial Psychology Vol(19):2;pp,170-187</td>
<td>Employee personality disposition such as self esteem and other personality aspects significantly correlated to employee job satisfaction level</td>
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<td>Reference &amp; Location</td>
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<td>Canada</td>
<td>Questionnaire survey method</td>
<td>Journal of Nursing Administration: Volume 38 - Issue 5 - pp 250-257</td>
<td>By relating the theoretical foundation of core self evaluation as suggested by Judge and colleagues researcher identified that employee personality disposition is key component to determine employee job satisfaction. Core self evaluation model comprised self esteem, self efficacy belief, locus of control, and neuroticism.</td>
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<td>Lerouge et al (2006)</td>
<td>Sample consisted 124 I.T managers from 500 companies responded survey</td>
<td>Information &amp; Management: Vol 43-issue8-pp 928-938</td>
<td>Empirical analysis identified that employee personality aspects such as self esteem and job perception have considerable impact on level of job satisfaction.</td>
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<td>USA</td>
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<td>Ronald et al (2005)</td>
<td>A set of questionnaire were distributed among 349 pharmaceutical company employees in Japan</td>
<td>Journal of organisational Behaviour Volume 26-pp 965-984</td>
<td>Study identified the four personality traits employee self esteem, self efficacy belief, locus of control, and neuroticism have considerable impact on employee job satisfaction in non western culture of Japan as well.</td>
</tr>
<tr>
<td>Japan</td>
<td>A set of questionnaire were distributed among 349 pharmaceutical company employees in Japan</td>
<td>Journal of organisational Behaviour Volume 26-pp 965-984</td>
<td>Study identified the four personality traits employee self esteem, self efficacy belief, locus of control, and neuroticism have considerable impact on employee job satisfaction in non western culture of Japan as well.</td>
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<td>Kohli (1985)</td>
<td>Questionnaire administrated among the Sample which consists of 114 salespeople from three companies involved in manufacturing and selling industrial goods</td>
<td>Journal of Marketing Research volume 22-pp 424-433</td>
<td>Study suggests that employee self esteem level significantly predict job satisfaction.</td>
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<td>Teas ,R.K(1982) USA</td>
<td>Data from 193 non supervisory employee given data via questionnaire survey instrument</td>
<td>Journal of Retailing Vol 58-pp. 4-26</td>
<td>Intrinsic factors such as self esteem and locus of control were found significantly related with employee motivation and work behaviour.</td>
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<td>Fields et al(2000) Hong Kong</td>
<td>Close ended questionnaire administrated through telephone conversation among diverse work force of employees and obtained 887 replies</td>
<td>Journal of organisational Behaviour Vol 21 pp-547-562</td>
<td>Fairness in procedures identified by researchers as the level to which an individual employee observe that he or she dealt with in fair or unfair conduct in organisation and such feeling of has considerable impact on his self esteem, general attitude and job satisfaction</td>
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<tr>
<td>Ling 2008 Taiwan</td>
<td>Survey questioner generated data from the sample 210 I .T professionals</td>
<td>Computers in human behaviour Vol 24- issue 1- pp 105-118</td>
<td>By applying Hackman and Oldham job characteristics model study explored and found significant role of task significance to predict employee job satisfaction</td>
</tr>
<tr>
<td>Proudfoot et al(2009) UK</td>
<td>Questionnaire were disseminated among 166 employees of British Insurance company in South-East England</td>
<td>Personality and Individual differences Vol 46- issue 2- pp 147-153</td>
<td>By analysing the data significant relationship was found between training, employee job attitude, turnover intention, self esteem. In addition it was identified that training involving cognitive process predict employee job satisfaction</td>
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</table>
Applying survey questionnaire instrument with the sample of 400 workers in Human service organisations in Israel an empirical study was conducted by Abu Bader (2000). He identified that working conditions such as level of comfort may significantly impact on level of employee job satisfaction.

In her empirical work Susan (2003) carried study with help of survey questionnaire in Russia to predict the factors influencing job satisfaction. Researcher established that acquiring job skills, opportunities for learning provided by organisation, and redesigning the job may assist to enhance level of employee job satisfaction. Furthermore, gender difference has no impact of employee job satisfaction level among employees in Russia.

Chu and Colleagues (2003) with the help of multiple regression analysis and exploratory factor analysis examined the predictors of employee job satisfaction. They recommended that employee personality disposition, fairness in procedures, job involvement and social support have positive and significant impact on job satisfaction.

Standard quality service in organisation not only satisfies the end users of that service but also have positive impact on the employees of organisation. Adams and Ann (2000) researched on the role of work environment, workload, and perception of accurate balance of work staff available in organisation to employee job attitude. The study disclosed that organisation may enhance job satisfaction level of employee through organisational work attributes.

Kinzl et al (2005) assessed the role of work conditions and control over making decision to determine employee job attitude for job satisfaction. By using Mann-Whitney, Kruskal-wallis and Pearson coefficient correlation they found that the employees who have control over decision making regarding their job and feel positive about comfort level at work place supposed to express higher level of job satisfaction.

A study with sample 281 nurses was conducted by Coward and colleagues (1985). A survey questionnaire used to collect information regarding job attitude from Nurses employed in long term health care services. Researchers identified that supporting role of supervisor for employee career aspiration considerably and positively influence to predict employee job satisfaction.
Schmidt (2007) examined the link of contentment with workplace training and employee job satisfaction in nine main organisations situated in USA and Canada. Outcome of empirical study suggested that organisation which provides sufficient training to employees, influence those employees job attitude to predict enhanced level of job satisfaction.

In same way Alina et al (2008) analysed the role of training, and human resources practices on employee job satisfaction from the sample British workers. Researchers found that ongoing learning (training) can be successfully used to motivate employee job attitude to express enhanced level of job satisfaction.

Whereas Zhao et al (1999) spotlighted on employee job satisfaction by using job attribute factors such that skill variety, autonomy, task identity feedback, and task significance. By administering survey questionnaire among 199 police employees, this study found that job attribute factors have considerable control over employee job satisfaction level.

Luthans et al (2008) examined the role supportive organisational climate and positive psychological capital such that resilience, optimism, and efficacy to employee job attitude. Researchers collected data from sample consisting of university management students, and high-tech manufacturing industry and found that positive organisational climate and psychological capital significantly and positively influence employee job attitude.

Likewise Jerry and colleagues (1994) studied the relationship of job tension, job clarity, and role conflict on employee job satisfaction. Researchers obtained data from the sample of customer service employees and found that job clarity influence job satisfaction only with the support of reducing job tension and role conflict. Job clarity to determine job satisfaction according to researchers is dependent on reduction in job tension and role conflict.

In USA based study Ting (1997) explored employee job satisfaction of USA public employees by applying work related factors and individual characteristics of employees. Researcher applying standard ordinary least square technique studied the relationship of employee demography, task clarity, task significance, and strong desire to serve public feeling among employees to determine employee job satisfaction. The outcome generated from the study revealed that organisation related factors such as task significance and clarity are positively and significantly correlated with job satisfaction. However, desire to serve public feeling have very minimal or no impact to predict employee job satisfaction.
Bright (1993) performed a study with two hundred five randomly selected public employees from the states of Indiana, Kentucky, and Oregon. Sample consisted of employees from the public health care agency, a city government. Researcher examined the relationship of person organisational fit, turnover intention, and public service motivation and employee job satisfaction. Researcher discovered that public service motivation has no value and significance to predict employee job satisfaction. However, person organisation congruence has significant impact of employee desire to serve public and job satisfaction attitude.

2.5 Personality aspects and Job Satisfaction

Employee personality aspects have considerable impact on employee job satisfaction and personality disposition plays substantial role to determine job satisfaction.

Weiss and Adler (1984) in their analysis stated that each individual possess specific mental state or condition which impact to certain extent to his or her job attitude. Numerous empirical studies have recognised that job satisfaction is linked considerably with personality aspects such as Self esteem (Pierce et al, 2004; Moore etal, 1997), employee self efficacy belief (Caprara et al, 2006; Judge and Bono, 2001), locus of control (Cummins, 1989; John et al, 2002) and neuroticism (Srivastava et al, 2010; Judge et al, 2005). These above stated studies concluded that employee personality disposition act as significant factor to predict employee job satisfaction.

Lerouge et al (2006) in their study with sample of Information technology developers in USA suggested that employee personality aspect of self esteem significantly and moderately impact to determine employee job satisfaction.

Chang and colleagues (2010) studied the relationship of self esteem and self efficacy personality aspects of employee to predict job satisfaction in 314 nurses from Northern Taiwan. Findings indicated that employee self esteem and self efficacy disposition are positively and significantly correlated with employee job satisfaction.

Siu and colleagues (1998) explored the relationship of locus of control, organisational commitment, psychological distress and employee job satisfaction. By applying numerous
validation approaches researchers found that employees locus of control has significant impact to determine employee job satisfaction.

Jude and Bono (2001) examined the core self evaluations traits evaluations called self esteem, generalised self efficacy, locus of control and emotional stability and found that these personality aspects are significantly correlated with employee job attitude to predict employee job satisfaction.

Locke et al (1996) argued that level of self esteem play vital part to predict employee job attitude for job satisfaction. According to researchers employees with enhanced level of self esteem will consider job as challenging and exert more efforts to succeed and experience more satisfaction.

Abraham (1999) examined the impact of self esteem personality aspect of employee to determine job satisfaction, Researcher gathered data from 108 employees of telecommunication, food service, and retail service employees and discovered that self esteem plays considerable role to determine employee job satisfaction.

Nurullah (2010) by using survey questionnaire examined employee personality disposition to predict job satisfaction. Researcher accumulated data from 1218 participants in the province of Alberta in Canada and found that self esteem aspect of personality is significantly and positively correlated with job satisfaction.

Staw et al (1986) explored the individual traits to determine employee job attitude to predict job performance and job satisfaction. Researchers discovered that employees’ personality aspects significantly and strongly correlated with their job satisfaction affect.

Silverstone (1991) argued that employee personality aspect of self esteem has implication to psychological problems and maladaptive behaviour. Author suggested that by enhancing employee self esteem to fulfil employee psychological needs organisations may overcome the inflexible and maladaptive behaviour issue from work force. Researcher discovered that high self esteem level among employees significantly impact on their job attitude.

David et al (1999) carried study in Florida; USA with sample of 327 student affairs administrative staff in academic administration and evaluated the impact locus of control personality aspect of employee to determine employee job satisfaction. Researchers found
that internal locus orientation is significantly and positively correlated with employee job attitude to predict job satisfaction.

Blackburn & Robinson (2008) concentrated on employee job satisfaction by examining the personality disposition of employee self efficacy belief. By administrating structured questionnaires among academic staff in USA, the authors found that employee self efficacy belief has strong and positive impact to predict employee job satisfaction.

Staples et al (1998) applied self efficacy theory that suggests that employee behaviour, environment and cognitive factors are highly linked and studied the impact of efficacy to job satisfaction. Researchers with the help of structural equation modelling technique discovered that employee self efficacy trait has considerable and positive impact on employee job attitude to predict job satisfaction.

By employing environmental and psychological variables model, Seo and colleagues (2004) analysed the organisational work attributes and employee personality disposition regarding employee job satisfaction affect. Authors recommended that personality disposition influence job satisfaction to considerable extent and personality disposition hold by employee before joining organisation will have impact on his or her work attitude i.e.: job satisfaction.

Back and Colleagues (2010) in their study examined the role of employee self efficacy belief to influence job satisfaction. Researchers by using maximum likelihood confirmatory factor analysis measure discovered that employee personality aspect of self efficacy may positively and strongly effect to determine employee job attitude and behaviour to predict job satisfaction.

Faragher et al (2005) in their systematic review and meta-analysis of 845 studies with considerably huge sample of 267995 individuals examined the relationship between employee job satisfaction and health. Researchers recognized that enhancement of job satisfaction level will have link to improved job satisfaction. Job satisfaction has also been significantly correlated with other mental health attributes including anxiety, depression, general mental health and employee self esteem.

Kevin et al (1981) explored the relationship of role perception, self esteem, job performance, and employee job satisfaction. Researchers accumulated data from 206 healthcare professionals in USA and examined the study variables with application of moderated
regression analysis method. Findings suggested that employee self esteem personality aspect has stronger impact on job satisfaction than on employee job performance level.

King et al (1982) conducted a study, with a sample 3328 employees working approximately about 30 hours in a week in organisations based in Canada, regarding feeling of internal and external locus of control orientations and their impact on job satisfaction. Researchers found that employees who have strong internals locus of control orientation experienced higher and enhanced level of job satisfaction.

Porwal and Sharma (1985) examined the job satisfaction and neuroticism among college faculty in India. The found that employee personality disposition of neuroticism is negatively and significantly correlated with employee job satisfaction.

Furnham and Zacherl (1986) concentrated on employee job satisfaction by applying three personality disposition factors such that Extroversion, Neuroticism, and psychoticism. By gathering data from 88 senior level employees in position of responsibility in a large multinational computer firm, the researcher found that employee personality aspect factors have considerable impact to determine job satisfaction. It was also identified that employee trait of neuroticism correlate negatively to job satisfaction.

Kirkcaldy et al (1989) evaluated the impact of job pressure and employee personality aspects such that Extroversion, psychoticism, and neuroticism on employee job satisfaction level. Researchers discovered that employee personality disposition of neuroticism is significantly and positively correlated with the job pressure and job dissatisfaction.

Judge et al (2002) examined the five factor based concept of personality correlates and their influence on employee job satisfaction affect. They found that traits of neuroticism and positive affectivity strongly correlate to employee job attitude and behaviour to determine employee job satisfaction.

Judge and colleagues (2008) approached 500 university employees belonging to diverse set of occupation and examined the personality correlates impact on employee job attitude to determine Job satisfaction. They found that extroversion or positively affectivity and neuroticism have considerable impact on employee job satisfaction ratings and it was empirically realised that neuroticism (emotional stability) is considerable and strong correlation with employee job satisfaction.
Malika and Stephen (2008) assessed the impact of personality aspects of emotional intelligence and neuroticism on general well being and job satisfaction. Researchers found that positivity affectivity trait, neuroticism and emotional intelligence significantly predict employee general well being and job satisfaction.

Anna (2010) examined the relationship between the anxiety and job satisfaction from three diverse approaches to well being. Researcher found that anxiety causes decline in employee job satisfaction and employees who have lower emotional stability or higher level of neuroticism may experience lower level of job satisfaction.

2.6 Gap

It is argued that especially in public sector organisation altruism or public service motivation induce employees to serve community and it is positively related to public sector employees’ job satisfaction. However, public service motivation and its relation to public sector employees’ job satisfaction are inconclusive and it stress upon the further exploration of factors that predict job satisfaction in public sector. This argument is supported by the studies of (Bright, 2008 & Moynihan, 2007). This creates gap and anticipate finding out the predictors of job satisfaction in public sector.

On the basis of mentioned gap and careful review of relevant literature this study aims to examine the influence of organisational attribute factors, and personality aspects on public sector health care organisations employees’ job satisfaction in Pakistan. This study will also examine the correlative model, which amalgamated the organisational attributes and employee personality aspects in unique formation as these factor have never been done before in prior literature.

Additionally in the context of Pakistan’s public sector work setting very little number of studies are available in the context of public sector employees job satisfaction and no major empirical work have been done. Keeping these facts in view this study will attempt fill the void of paucity of empirical studies in the context of less affluent countries like Pakistan and provide insight to the phenomenon of job satisfaction.
Apart from that mainly the earlier studies have been done in context of industrial, financial, manufacturing, and academic employees, which anticipates the need to examine the job attitude and motivation in the context of Health professionals specifically in the perspective of Pakistan. This study mainly assesses the employee job satisfaction predictors in Public health care organisations in Pakistan.

### 2.7 Conclusion

In the course of wide-ranging competition, volatility, amalgamations, growth, expertise and other internal or external causes, nowadays organisations have to modify strategies, configuration, and course of actions, management style, modus operandi, services or administration to deal and tackle with this situation. Variation in job attitude and motivation among employees might be trivial or significant, aggregate or incremental but requires right attentiveness from employers. Its cost can shape the organisation’s performance, development, reputation and endurance, as well as wasting managerial resources and organisational spending and costs. The literature discloses that examining employee job attitude nowadays is more intricate and complex than ever before, hence it needs more judicious and appropriate attention. The literature in the employee motivation and job satisfaction domain has concluded that the exploration of organisational attributes employee personality factors are the most important for successful and effective implementation of organisational policies, quality services and exuberant workforce. Though every employee has diverse characteristics, motivational attitudes, familiarity, values and activities, in spite of this, employee reaction depends upon his or her attitudes, convictions and intention. Employees’ job attitude to determine satisfaction based upon their first hand or immediate perception which can fluctuate according to diverse experiences, home and outside environmental factors, awareness, and upcoming expectations as well. The literature accessible on employee Job satisfaction factors has been categorised into two groups such that Organisational and personality disposition. In fact, employees can build up their anticipations, beliefs and job attitudes on the basis of organisational atmosphere and organisational work attributes. In organisational attribute factors researchers have included the organisational environment, policies, regulations, and employers’ attitude towards employees and facilities factors. Whereas, personality factors are associated to personal, psychological and societal aspects having a constructive or negative effect on employee for
reducing the uncertainties of rapidly changing workplace circumstance regarding job attitude. By probing these factors in diverse patterns, researchers have identified noteworthy results to determine employee job attitude for job satisfaction. Literature reviewed in this chapter identified that organisational work attributes and employee psychological disposition are very important factors in the domain of employee job satisfaction. Despite the fact every individual has different frame of mind, employee job attitude and motivation depend significantly on organisational job attributes and psychological aspects in work setting. Literature reviewed classified employee job satisfaction in broader classifications such that organisational based factors and employee individual personality aspects. Organisational based factors include perception of fairness, team work (esprit de corps), on job training, working condition, and job clarity as determinants to judge employee job satisfaction. Employee individual personality aspects include employee self esteem, locus of control orientation, Neuroticism, and self efficacy belief having considerable impact on employee motivational attitude.

Majority of work regarding these factors to determine employee job satisfaction have been conducted in USA, Canada, and UK where employee job attitude predictors relationships are different and contrasting than country like Pakistan. The best of the knowledge of researcher hardly any studies in the domain of job attitude focusing Pakistan which have measured the theme of organisational work attributes and psychological correlates to determine employee job satisfaction. Hence researcher intended to examine the magnitude of organisational based factor and employee personality aspects concurrent impact on employee job satisfaction. The literature indicates that if employees are contented with their Organisation policies or job they may transform their attitudes and behaviours regarding their job and display more exuberance and act far more effectively and efficiently. Consequently organisations will perform well and provide better services to end users. Rationalization of this study is that Government of Pakistan has introduced new health care policy called Health for all (HFA) to improve over healthcare portfolio of health care set up in Pakistan.
Chapter Three: Framework and Hypotheses

3.0 Introduction

This study aims to evaluate employee job attitude predictors to develop employee positive behaviour and attitude for job satisfaction. In this regards the chapter two discussed and elaborated the existing job satisfaction theories and empirical studies in order to develop a conceptual framework and construct a basis for hypothesis development. Regardless The development of hypotheses is main objective of this chapter which will in turn analyse and evaluate the job satisfaction theories in order to discover how significantly these theories predict job satisfaction. Second objective of this study is to present an employee job satisfaction model based on theoretical framework to evaluate employee job satisfaction predictors in public sector healthcare institutions of Pakistan.

Following section will highlight and evaluate the suggested research framework and proposition which in turn will be further explored and examined. The proposed framework for this study is based on following eleven constructs.

- **Job satisfaction**
  - Contentment or pleasure derived from job.
- **Procedural Justice**
  - Perception of fairness in relation to rewards and procedures.
- **Job Training**
  - Set of designed activities to increase job knowledge and skills.
- **Working conditions**
  - Physical environment and degree of comfort at work place.
- **Esprit de corps**
  - Individual’s belief to act as team in organisation.
- **Job clarity**
  - Employees’ precision concerning their role and expectation in organisation.
- **Task significance**
  - Meaningfulness and impact of work in and outside organisation.
- **Self efficacy**
  - Individuals basic strength to face difficulties and be successful to produce designated performance
• Locus of control
  o Level of control an individual has over event which take place in life
• Self esteem
  o Individuals appraisal of their own personality stature
• Neuroticism
  o Ability to feel calm and display less reactivity to day to day occurrences, a personality attribute characterized by shakiness, apprehension, aggression.

The following section will represent the proposed research framework and number of hypotheses that will be further evaluated and tested.

3.1 Research Framework and Development of Hypotheses

Job satisfaction is pleasure that an employee derives from his work (Bradley & Brian, 2003). The overall feeling (affect) one has about his job determine his job satisfaction rating (Arnold & Feldman, 1986).

Organisations can determine job satisfaction rating of an employee by assessing the degree of comfort employee has with job characteristics of task he is carrying on (Ting, 1997). The balance between inputs and outputs also helpful to determine job satisfaction. In organisation where inputs like education, working time, task effort are compatible with work out put like wages, fringe benefits, status, task significance, and working conditions. It is most likely that employees will report higher job satisfaction ratings (Sousa-Poza, & Sousa-Poza, 2000).

Employee job satisfaction has been linked with how people believe experience and perceive their jobs (Spector, 1997). It is typically used in the domain of human resources development where believed that employee reports satisfaction with intrinsic and extrinsic features of job (Chang, 2010). In other expression Job satisfaction is pleasurable emotional condition resulting from assessment of one’s job or job experience (Locke, 1976). According to Rainey (1997), job satisfaction is extensively studied variable in organisational research which is pertinent that how people feel about their job and various aspects of their job. It is really scale to asses that what people like or dislike about their job (Spector, 1997).

As confirmed by many researchers, job satisfaction has been used as a behavioural aspect of employee toward the organisation (Cranny, et al., 1992; Sweeney et al., 2002). Building on
different theories researchers examined many factors like motivational behaviours, hygiene factors and others like management role, organisational environment, and employee learning perception (Darrow, 1971; Igalens and Roussel, 1999; Kuo, 2008; Brewer, et al., 2008; Ahsan, et al., 2009). However, its impact was found as retention, turnover, job stress or intention to leave (Cangelosi, et al., 1998; Ahsan, et al., 2009).

In literature so many theories have been applied for employee satisfaction. One of the important theories is Maslow’s need theory that suggests human hierarchical needs that ranging form psychological to self actualisation. On the basis of need fulfilment theory many researchers such that Kuhlen (1963); Conrad et al. (1985) approached to know the employee satisfaction. From other side job satisfaction was related to important traditional views that formulated by Herzberg and Mausner (1959). This theory is based on intrinsic and extrinsic factors such that achievement, recognition, responsibility, salary, policy, interpersonal relationships, administration, and working conditions. Nonetheless, employee personality disposition has also significant impact on the level of job satisfaction as put together by Judge and colleagues (1997). The employee dispositional factors recommended by Judge et al (1997) are employee self esteem, self efficacy belief, employee locus of control orientation, and emotional stability. However, employees are to be known as more mobile now than ever before because of regularly changing careers, jobs and employers (Schmidt, 2007). Thus employee attitudes and behaviours relating to satisfaction are imperative for researchers and employers.

Thus, this study attempted to examine work attributes and personality aspects factors relationships with job satisfaction. It is aimed to assess the varying magnitude and generalisability of pre-dominantly western theories from health care professionals’ point of view in work setting of Pakistan. The researcher has attempted to reduce the paucity of empirical studies in the domain of employee job satisfaction from health care professionals’ perspective in Pakistan work setting. All these theories have been examined in numerous work settings in western countries and some non-western countries as well and have shown consistency across the cultures (.Srivastava et al ,2010; Elish etal (2009; Chu et al , 2003)

Consequently it necessitates for further examination of factors that might assist to develop a comprehensive model of employee job satisfaction addressing both organisational based attributes and employee personality aspects. On the basis of literature review as depicted in Figure(5) a set of predictors are hypothesised to be correlated to employee job satisfaction in following framework(Figure6).
3.1.1 Procedural Justice

Perceived Procedural justice (PPJ) is about how people conclude that procedure or system is fair or unfair? In simple words procedural justice is about fairness in procedures through which rewards are distributed (Leventhal et al, 1980). According to Dailey and Kirk (1992) Justice Problem occurs at three levels which are distribution of outcomes, dispensing...
procedures, and design of organizational system. Major concerns arise about fairness when individuals evaluate how outcomes were distributed and, what procedures were used to distribute those outcomes, and what organizational systems are in place to make it ensure that all groups are treated fairly (Linda and Tyler, 1988). Justice usually produces immediate and direct consequence. Equitable pay improves individual performance, equal treatment raises group spirit, and voice creates a loyal ally. Procedural justice creates loyalty toward management, and systematic justice results in loyalty to firm and its objectives. Over all distributive fairness results in job satisfaction and more positive attitude toward one's boss (Greenberg, 1990). Perceived procedural justice and opportunities for voice were highly related to firm loyalty and satisfaction. Loyalty also supports to retain employees in your organisation. (Sheppard et al., 1992). People often consider procedures as fair when procedures are in conformity with moral and ethical standards, suppress bias, facilitate accurate representation of the opinions of affected, and provide provisions to correct the bad decision. (Leventhal et al., 1980). In literature this factor has extensively been applied to determine the employee satisfaction (Lambert et al., 2007; Leventhal et al., 1980; Lambert, 2003). The study of Lambert (2003) assessed at the impact of procedural justice on employee job satisfaction and discovered that procedural justice has considerable positive impact on employee satisfaction level. Dailey and Kirk (1992) in their findings stressed the need of procedural justice to hold and keep workforce contend. In addition researchers state that deficiency of procedural justice in organisations may cause to dissatisfaction and quitting trend in employees. In the same line loads of studies of employee job attitudes have identified the influence of perceived fairness in processes of justice on employee job satisfaction for example Folger and Konovsky (1989) analyse the role of PPJ on employee job satisfaction from the first line employees of private organisation in USA. Further Huo et al., (1996) and Mcfarlin and Sweeney (1992) examined PPJ and employee job satisfaction in the perspective of public sector organisations and financial sector workforces respectively. Organisations with professional workforce who have elevated mobility must have to take into consideration the procedural justice perception of its employees in order to keep them satisfied and effectual. Lambert et al. (2007) recommended that employees PPJ as fairness of process through which distributive decisions like promotions in organisation, evaluations, and rewards are determined. Keeping above discourse in view this study specifically aims to examine the impact of perceived procedural justice on employee job satisfaction in the context of health care professionals and it may proposed to have affirmative and significant influence on health practitioners’ job attitudes. It is supposed that very little number of
studies has empirically examined the PPJ impact on employee job attitudes working in health care sector and the scarcity of empirical findings is observed (McAuliffe et al., 2009). Thus proposed hypothesis is as followed:

**H1: Procedural justice (fairness in distribution of outcomes) has Positive link to employees’ job satisfaction level**

### 3.1.2 Job Training

In worldwide economy of the globe, employees have more proviso of learning for improving their career. Individuals Job attitudes and behaviours towards career satisfaction is a wide issue in the domain of organisational behaviour and human resources development. In literature several researchers suggested that job training is a worth considering determinant of employee positive attitudes (Shields and Wheatley, 2002; Schmidt, 2007). It is a set of designed activities on the part of an employer or organisation to considerably enhance the job knowledge and skills of its members in an approach consistent with the objectives of organisation (Landy, 1985). Georgellis and Lange (2007) explained job training is accessibility of printed materials for learning, courses, partaking in seminars, and symposiums for the employees in organisation. Authors also recommended that job training is an important predictor of employee job satisfaction however, surprisingly very little attention have been given to the relationship of job training to job attitudes.

In literature numerous authors maintained the relationship between job training and employee satisfaction. Melymuka (2004) highlighted in study of information technology (IT) professionals that job dissatisfaction creeps in among them is due to non availability of job training which they expected to have from their job. Likewise Shields and Wheatley (2002) in their empirical study of Nurses in UK also discovered the lack of job training opportunities has impact on employee job satisfaction. In another study in UK Jones and Tonsel (2008) and Gazioglu and Emily (2006) found the affirmative impact of job training on employee job satisfaction. The same out has been reported by Tanja et al. (2003) from the sample of Chinese academics working in rural parts of China. Blum and Kaplan (2000) have also found the positive relationship between chance to learn new skills and employee job satisfaction. From all above studied job training was found most effective in helping employees to learn new things relating to performance. Siddiqui et al. (2003) in a study of continuous professional development of doctors in Pakistan has also recognised the role of continuous training to update employees working in government hospitals. Haq et al. (2008) in their
empirical analysis of job stress among health workers in Pakistan discovered that need of helpful communication training among health workers considerably affect their work and main cause of their job dissatisfaction. On the basis of above study, researcher assume that in the context of health professional in Pakistan, the provision of job training will have positive impact on employee job attitudes and therefore it is propose that:

\[ H2: \text{Job related training given to employees has significant and positive influence on their job satisfaction level.} \]

3.1.3 Working Conditions

Working conditions include physical environment at organisation (work space, noise, lighting etc) and degree of comfort provided by organisation to employees. Unfavourable environment, poor human and machine contact, obnoxious working conditions may cause great distress to employees in any organisation (poggi, 2008). Emin (2007) in analysis of work attribute discovered that work place conditions such that rough weather, extreme temperature levels, chemical smells, noise, poor arrangements for lighting and similar difficulties reduce employees’ concentration and consequently reduce job satisfaction. Like wise Kinzl etal (2005) identified the relationship between improved working condition, among health care professionals in Switzerland, and job satisfaction. In addition theses researchers suggested that high level of job satisfaction among health professionals depend upon interesting work demands, opportunity to apply skills, ideas and improved standard working conditions.

Krueger and colleagues (2002) in their study found that employee job satisfaction is multi dimensional phenomenon and its outcome depend upon assessment of employees’ workplace conditions and level of satisfaction may vary on the quality level of work condition. A study by Siu (2002) in Hong Kong collected data from the sample of 114 general and 144 psychiatric nurses including both male and female has identified working conditions (physical conditions) as one of significant predictors of Job satisfaction. Author discovered that challenge, variety, decision making and physical Working conditions significantly affect employee job satisfaction. A study in Taiwan with sample size of 412 non supervisory nurses,
400 social workers at 15 human service department in Israel, and 150 software developers in 22 software organisations have indicated considerable link of working conditions to employees’ job satisfaction (Chu et al 2003; Bader 2000; Javed et al 2004). Another study inclusive of 814 employees from 12 university hospitals in Iran also highlighted the link between employees’ job satisfaction and working conditions (RAD 2006). Therefore with the support of Vernon et al (1992); Kloep et al (1994); Lederer et al (2006); Yasuhraru et al (2009) argument here is that working conditions in organisation are considerable factor which influence employee job attitude and motivation to predict job satisfaction. Consequently the following hypothesis is proposed

**H3 There is significant and positive relationship between quality working conditions at workplace and employee job satisfaction**

### 3.1.4 Esprit de corps

Esprit de corps denotes to employees feeling to act as team in organisation. This feeling of team has considerable and positive influence on employees’ job satisfaction level. According to Jones and James (1979) group esprit de corps denotes to the limit to which individuals take pride in their work group, additionally it characterise the open communication and friendly environment. Interpersonal relations among workers may emerge into motivating force that might be helpful to affect employees’ job satisfaction level. It is special vigour which attach individual with other work mates who are having similar vigour in them and hence form an environment of team work and infuse energy among workers toward organisational goals (Boyt etal 2005) Esprit de corps is depth and intensity of feeling which one has about being part of large group in organisation (Boyt et al, 2001)

Esprit de corps is familiarised as adding to team involvement and as dynamic factor behind team force. Esprit de corps is individual dependent category phenomenon which is supported upon feelings and beliefs that the employee keeps about the work group. Esprit de corps is well recognized as team spirit which exits in organisation and characterise to what level employees in the organisation are concerned about each other’s problems (Jaworski and Kohli 1993). Boyt et al. (2005) suggested that team is composed of group of people who collectively dependent on each other’s work as in contour of team to reach a common
purpose that performs as biding force for the team. Furthermore researchers suggest this phenomenon as group cohesiveness (unity), organisational identification (recognition) and esprit de corps. In fact, team spirit is made up of enthusiastically shared feelings, viewpoints and values about group association and performance (Boyt et al., 2001). In addition authors articulate esprit de corps or team spirit in organisation indicates the strong aspiration to attain common goal even in the face of difficult circumstances or hostility. William et al. (2005) identify esprit de corps as the altitude to which employee obliged to common goal and to one another in the organisation. In addition esprit de corps is valued benefit among organisational members who do not have formal influential power over each other (Homburg et al., 2002).

In literature the term has been widely applied to know the employee satisfaction and found mixed outcomes. Like, Meral and Lutfihak (2009) in their study sample of employee from Telecommunication sector organisation in Turkey have acknowledged affirmative impact of team spirit on their job satisfaction level. Boyt et al. (2001) also established the positive correlation between esprit de corps and employee job satisfaction level. Authors further suggested that increase in esprit de corps due perceived social capital will increase employee satisfaction level. On the other hand Hwang and Chang (2009) in their study of public sector employees’ in Korea indicate that the esprit de corps feeling of warmth and workgroup friendliness has not very considerable impact on their job attitude. Study carried in Pakistan from the sample of IT professional however indicated that the concept of esprit corps is not very popular and new in Pakistan and employee mostly pursues their individual tasks as part of job assigned to them (Trimizi, 2009). Since the concept of esprit de corps has mixed outcomes and especially in developing country. It can be argued that this concept is new in Pakistan and in the context of organisations have varying results. Therefore it is proposed that

**H4: Prevalence of esprit de corps (team spirit) among public employees is positively linked to their job satisfaction level.**

### 3.1.5 Job Clarity

Task or job clarity is very important in most instances to accomplish any task. Zeffane and Al Zarooni (2008) describe job clarity as how clearly employees see their roles and expectations
in their organisation. Job clarity is an essential part of any organisation and long lasting feature of modern management. Job clarity also assists in earning excellence. In addition when employees are clearly informed about their roles and goals of their organisation, they tend to attach this with good management. Job clarity refers to the level to which job tasks and rules affecting how to perform them are clearly communicated to employees. This has link to employee’s sense of knowing and what is expected from employee to perform (Berry et al, 1990; Jansen et al, 1996). Ann and others (2000) collected data from 833 Registered nurses and registered nurse midwives revealed that goal clarity has impact on employees’ job satisfaction. According to them the organisations which have well defined work place goals that are realistic, approachable, and assessable may enhance job satisfaction level of employees with the help of these attributes. Locke & Latham, 2002 and Ting, 1990 argue that goal that are specific and require considerable amount of effort to achieve contribute to higher performance and motivation rather than the goals which are ambiguous or easy. Role clarity embeds sense of purpose and develops belief among employees that the goal is achievable and facilitates greater job satisfaction.

Kim (2009) elaborate job clarity as is the degree to which desired responsibilities and expectations of job are made clear to employee. It is linked to the organisational structure and typically having roots in how plainly employees see their expectations and functions in organisation (Zeffane and Al Zarooni, 2008). In other way job clarity is a factor that moves in hand to hand with employee performance and expected to improve organisation effectiveness and efficiency (Locke and Latham, 2002). Empirical exploration shows that clarity of job lessens uncertainty and attitude of learning through hit and trial risk among employees. Apart from that job clarity helps employees to regulate with their job and reduce ambiguity (Ting, 1997).

In literature the job clarity factor has mixed response. Kroposki et al. (1999) from the sample of employees in health care organisation reported that role ambiguity and paucity of clear information about job errands may have unpleasant effect on employee job satisfaction. Authors recommended for the strategies that diminish job ambiguity to increase job satisfaction level. Whereas Smerek et al (2007) in their analysis of public university administrative staff recognised the negative correlations between job clarity and employee job satisfaction. Since the literature has shifting results about the relationship of job clarity and employee job satisfaction. Researcher on the basis this discourse developed argument and rationale that job clarity variable has significant role to examine employee job attitude
and behaviour to determine employee job satisfaction. In result this study propose following hypothesis

\[ H5: \text{Perception of job clarity among employees has significant and affirmative impact on their Job satisfaction level} \]

### 3.1.6 Task significance

Task value or significance is described as an extent to which identifiable piece of work affects, or is important to, others within or outside the organisation. Employee’s knowledge of other people’s reliance on the work performed by him has influence on that employee’s job satisfaction (Charles et al., 1988). Task significance is determined by the degree to which job has influence over others. Task significance gives meaningfulness to job and influences the perception of individuals in relation to their contributions to organisation mission (Katz, 1978). When individual employee recognizes that outcome of his task probably have considerable impact on well being of others, the significance of such work is normally enhanced and creates motivation (Grant, 2008). Brannon et al. (1988) in their analysis from the sample of healthcare professionals in USA recognised that employee work attribute of task significance significantly and positively contribute to job satisfaction level. Ting (1997) in his empirical study using survey collected from 30838 federal employees in USA has signified the link between employees’ job satisfaction and task value. Researcher suggested that employees who feel that their work has value and worth to accomplish organisation mission are likely to perceive more job satisfaction. Similar results have been found by Ling (2008) in study of Information system professionals from 500 enterprises based in Taiwan. He argued that Information personnel’s perception about the importance of their work impact on their job satisfaction level. Farn et al (1993) have also highlighted the employees’ perception and recognised the degree of job outcome effects on the organisation and other tasks and found considerable impact of task significance to job satisfaction. In accordance to above studies, numerous researchers consider that task significance is one the of essential predictor of employee job satisfaction (Brannon et al., 1988; Campion et al.1993) and largely
literature recognise the subsistence of affirmative association between task significance and employee job satisfaction (Ting, 1997; Hackman and Oldham, 1976). Consequently this leads to purpose the following hypothesis.

H6: Employees perception of task value/significance has positive correlation to their job satisfaction level

3.1.7 Self efficacy

Self efficacy is an individual’s basic strength to deal with life demands, difficulties, and dilemmas, to perform, and be successful (Piccolo et al, 2005). Schwarzer (1992) in his findings stated employee self efficacy belief as thought control of actions and suggested that prevalence of strong efficacy belief among employee assist them to well integrate in organisation and feel more contend. Eden et al (1995) describe self efficacy as important factor to motivate employees especially in very stressful occupations. Authors further suggested that efficacy trait hold by those individuals who consider them to be able to perform numerous tasks effectively. Likewise Bono and Judge (2003) describe self efficacy is one’s estimate to his or her ability to perform at global level across varied circumstances. Therefore, it might be argued that self efficacy disposition displays one’s effective in relation to his/her abilities to perform across number of different situations (Judge and Larsen, 2001). Bandura (1982) says that one’s judgement of “how well one can execute course of action required dealing with prospective situation” exhibit his self efficacy. Social cognitive theory elaborate that expectation of effectiveness trait determine, whether coping actions will be commenced, what level course of action will be expended, and how long such effort and attempt will be continued in the state of aversive circumstance (Bandura, 1977.) According to Johnson et al. (2008) one’s higher ability to cope with life problems and having higher self efficacy may result in low level of frustration and stress. Such individual may have greater satisfaction and success at work place. The study of Piccolo et al. (2005) reveals that self efficacy is significantly correlated to job satisfaction. Judge and Bono (2001) in their study of relationship between different personality aspects and job satisfaction found that employee personality trait of self efficacy belief was considerably and directly correlated with individuals’ job satisfaction. Similarly the study of Judge et al (2008) has also confirmed the
unique relationship of self efficacy as one of the constructs of personality aspects to job satisfaction. Chang et al (2010) discovered in their study the role of self efficacy belief to determine job satisfaction from the sample of health care professionals and verified the affirmative and strong impact of efficacy trait on employee job attitude. Self efficacy trait influences employee job satisfaction by means of its link to effectiveness on job (Judge et al, 1997). Since Individuals who possess better level of self efficacy often tackle more successfully with difficult situations and continue in hard and extraordinary circumstances (Gist et al, 1992). Keeping theses studies in view researcher has developed a proposition that employee self efficacy belief trait has significant and positive correlation to employee job satisfaction (Judge and Bono, 2001; Scholz et al, 2002; Staples et al, 1998) consequently it is hypothesized that

\[ H7: \text{Self efficacy trait of personality is positively related to job satisfaction level.} \]

### 3.1.8 Locus of Control

Locus of control orientation of individuals refers to the degree of control an individual considers he has over the events which take place in his/her life (Piccolo et al, 2005). Dispositional affect and job satisfaction study by Judge and Larsen (2001) elaborates Locus of control orientation as perceived degree of control in life divided it in two Internal and external categories. Individuals with internal and external locus of control have different view of their life. People with internal locus of control understand that their own behaviour control their lives. On the other side people with external locus of control perceive that life is controlled by external factors like luck, chance, fate, or other powerful individual. Arguably the people who have different perception about their lives may have different perception toward their work. Johnson et al. (2008) in Core self evaluation theory examines locus of control and stated as a one’s capacity to influence the environment and produce desired outcome considerably influence his or her job attitude such that Job satisfaction. External locus of control personality attributes characterise feeling of futility and helplessness while internal control attributes are like having feeling to overcome the obstacles, setbacks with magnanimity and tackle challenges with courage and persistence in face of difficulties (Judge et al, 1998). Spector (1982) in his study of Behaviour as function of locus
of control reported that employee locus of control significantly correlated with employee job attitude to determine job satisfaction and employee with different locus of control report differently to job satisfaction. Edwards (1988) in analysis of determinants and consequences of coping stress suggested the generalised expectation of control as one of the important personality variables to determine employee job attitudes such as job satisfaction. Likewise Leung et al (1988) discovered that people who have external locus of control orientation and believe in luck, chance, and powerful others and may report less job satisfaction. They additionally reported that external locus of control orientation significantly and positively correlated with mental and physical ill health. In the context of health professionals job attitude Blegen (1993) reported that employee psychological orientation of locus of control significantly influence employee job attitude to predict job satisfaction. Similarly Leung et al (2000) also reported that employee external orientation of locus of control significantly predicts employee job satisfaction. Therefore researcher has developed rational that employee locus of control significantly influences job satisfaction and following hypothesis proposed.

H8: Employees’ degree of control over the life events (locus of control) is positively correlated to their job satisfaction.

3.1.9 Self esteem

Employee personality aspect of self esteem refers to individuals’ evaluation or appraisal of their own self stature (Johnson et al, 2008). In the empirical analysis of Judge and Larsen (2001 titled dispositional affect and job satisfaction, self esteem is defined as overall value one places on him/herself. Self esteem indicates the overall worth that one gives to himself as individual. Faragher etal (200) have reported that self esteem trait significantly and positively correlated to employee job satisfaction. The study of the relationship between self-esteem and job satisfaction of personnel in government organisations by Alvi & Askairpur (2003) have identified significant role of self-esteem on employee job satisfaction and reported that those employees who have enhanced level of esteem tend to feel more contend.
Numerous research studies described self esteem as is a kind of (better-self evaluation) which is based core element of an individual’s positive concept of oneself (Greenwald et al., 1988; Judge et al., 2001). Generally self esteem can be characterised as worth one gives oneself as a person (Pierce et al., 2004). Judge et al. (1998) argue that people who have high level self esteem tend to be stable, vibrant, and view positive of them where as low self esteem individuals depict themselves unclear, incomplete, and contradictory in their views and this has very imperative influence on their job attitude. Faragher et al. (2005) in their study of job satisfaction and health relationship found the significant relationship between satisfaction level among employees and its impact on their feeling self worth and self concept such as self esteem. D.K. Vohra in his work of how to cultivate self esteem states that self esteem has direct link to employee personal and professional satisfaction.

In addition Vohra added that every psychological problem from anxiety to chronic hostility is traceable to low self esteem. Vohra furthermore suggest that in present era of competition and high mobility employee personal happiness and economic existence based upon understanding the self esteem of one’s own and develop it in others. (Vohra, 2004). Nurullah (2010) from the sample of emerging adults in Alberta, Canada have also found significant correlation between employee job satisfaction and self esteem level. He argued that self esteem is strong predictor of employee job satisfaction and suggested to initiate the strategies which increase self worth (esteem) level among employees and which will ultimately result in better psychological well being of employees and add to satisfaction level. Komran (1970) in his empirical study of work behaviour reported that high self esteem employees choose professions which are consistent with their preference and such individuals will employ in broad range of activities and derive better level of job satisfaction. Likewise Judge and Bono (2001) discovered the straight positive and significant correlation between employee self esteem trait and employee job satisfaction and reported that employees who possess higher level of self esteem consider challenging task as opportunity to benefit from and consequently develop enhanced level of contentment. In other study Chang and others (2010) examined the set of personality traits in relation to employee job satisfaction within the context of healthcare professionals and reported that employee self esteem significantly and positively correlated with job satisfaction.
Drawing upon core self evaluations theoretical rationale and empirical substantiation (Judge et al, 2001, pierce et al, 2004; Sawada et al, 2004), it is contemplate that employees self esteem will have significant and affirmative impact on their job satisfaction level. As a result researcher developed following hypothesis

\[ H9: \text{Employees self esteem is positively and significantly correlated to their job satisfaction.} \]

### 3.1.10 Neuroticism (Emotional adjustment)

Neuroticism trait of personality relates to emotional stability or emotional adjustment. Bienvenu and others (2007) in their analysis of low extraversion and high neuroticism as indices of social Phobias published in American journal of psychiatry describe neuroticism as person’s broad inclination to experience negative emotions such that nervousness, sadness, and anger. Johnson et al (2008) in their review of personality aspects reported neuroticism as emotional stability and trait of one’s personality which reflect his or her ability to feel calm and secure and display less reactivity to day to day occurrences. Additionally researchers stated that People who are emotionally steady are less likely to recall about negativities and have strength to cope with negativities. As a result this capability makes such individuals emotionally stable and defiant against negativity and leads those to have higher job satisfaction from their jobs. According to Watson, (2000) neuroticism is personality tendency to focus on pessimistic aspects of life. People who stand firm against this tendency and attempt to look at optimistic posture of the affairs and score low towards neuroticism are likely to have more job satisfaction. Several studies reported that individuals who have poor emotional adjustment has tendency to overreact the situations and such individuals are susceptible to negativities. This dispositional inefficiency to defend against odd conditions leads to frustration and make employees less motivated and in result such employees derives less satisfaction from job(Furnham and zachler,1986;Judge et al, 1998; Piccolo et al, 2005). Judge and colleagues (2002) in their five factor model of personality reported that employees who have lower emotional stability and psychologically tend to be high neurotic likely to derive less job satisfaction. Miller et al (2009) analysed employee personality aspect of neuroticism in the context of public sector employees and reported that neuroticism significantly determine employee job attitude to predict job satisfaction. Cropanzano et al
(1993) have also reported the considerable role of personality attributes to determine job satisfaction. They further identified that employee personality aspect of neuroticism is linked with lower job satisfaction. Likewise McCrae and Costa (1991) stated that personality aspect of neuroticism characterise diminished well being for the reason that those who score high on neuroticism are inclined to experience negative effects. In turn negative effects predict significantly and negatively to job satisfaction (Judge et al, 2001).

Therefore, employees high in neuroticism will predict that they are likely to derive less job satisfaction and tend to be nervous, sad, and reactive to unpleasant situations (Watson, 2000, Judge et al, 2001, Johnson et al, 2008). As a result researcher developed argument that employees’ neuroticism trait is negatively correlated to job satisfaction and following hypothesis is proposed.

**H10: Employees neuroticism trait has negative correlation to employee job satisfaction level**

3.2 Demography

Along with the organisational attributes and personality disposition factors demographic variables also act as considerable determinants to predict employee job satisfaction level. In order to develop employee job attitude and behaviour demographic information can be regarded as an important consideration to be taken into account to determine job satisfaction. These factors of demography such that age, gender, marital status, length of job and education are labelled as extra related factors (Oshagbemi, 2000; Sengin, 2003). In order to determine employee job attitude to predict employee job satisfaction employee demography has mixed and contrasting results on individual outcomes. Miller et al (2009) in their empirical analysis reported that demography has very marginal or no considerable impact to predict employee job attitude in relation to job satisfaction. On other side numerous empirical studies and researchers in the domain of employee job satisfaction reported that employee demography variable affect employee job attitude to an extent to predict job satisfaction (Cooper & Kelly, 1993; Jules and Christopher, 2009). However, employee attitude and behaviour to predict job satisfaction far more dependent on work based factors and personality disposition (Lambert et al, 2007; Judge et al, 2001).
Conclusion

Careful review of literature on employee job satisfaction and its predictors carried for this doctoral thesis has revealed that individuals’ motivational behaviours to predict satisfaction are influenced by organisational work attributes and psychological disposition. As a result it is important to discover and examine the magnitude of employee disposition and organisational work attribute factor to predict employee job satisfaction.

After integrating the literature review presented in chapter 2, the present chapter developed a model of employee job satisfaction. This model has two main categories that is to say extrinsic and intrinsic factors. Extrinsic factors represent the rewards and features which are controlled by others like promotions, salary rise, recognition, better physical working conditions. On other hand intrinsic factors denote to the outcomes within the control of the persons themselves, such as contentment feeling, and accomplishment. Satisfaction of employee with extrinsic factors can be developed on the basis of benefits provided by organisations such that promotions, providing bigger desk to employee, praise for work done and recognition. Successful application of extrinsic factors by employer develops such job attitude in employee to perceive work as instrument to fulfilment of organisational and other goals. Likewise in organisation where employee acquires fulfilment of intrinsic factors than such fulfilment develops motivation that come from within a person such as self esteem, competence, contentment, and accomplishment. Hence researcher has amalgamated the both factors that depend on external aspects and internal aspects in unique formation in correlative conceptual model to determine employee job attitude for job satisfaction. Apart from developing job satisfaction model this chapter supplied detailed exploration of predictors of employee job satisfaction. Consequently this thesis has developed some hypotheses which demonstrated the different relationships of organisational work attributes and personality disposition in integrative frame work provided. Rationalization for this study is that recently in Pakistan new health policy introduced to revitalise the healthcare services in Pakistan.
Chapter Four: Research Methodology

The method section of this research study concerns the selection of correct methodology by which the validity of the research is evaluated. Therefore it requires a clear and comprehensive rationalisation of how the study is to be carried out and why the researcher adopted that particular method.

In this chapter the research methodology outline is drawn and the researcher determines the theoretical basis to investigate the main concept of employee job satisfaction. The chapter first discusses the research philosophy and scrutinises the ontological, epistemological, and methodical assumptions that shape the foundation of the research. Later on in this chapter the researcher discusses selected research philosophy including the justification and research techniques for data collection. This follows the illustrated research framework, including research phases and processes along with a discussion of the data-gathering instrument and analysis.

4.0 Research philosophy

Research philosophy is the approach by which the researcher regards the development of knowledge. This is related to the philosophical stance of the researcher. In the research domain there are two main research paradigms namely, positivism and phenomenology (Hussey & Hussey, 1997). The positivist paradigm is dependent upon the prior fixed relationship of the phenomena, and is typically investigated with structured instrumentation. These types of studies are primarily carried out to test theories in an attempt to increase the predictive understanding of the phenomena. The second paradigm of the research is phenomenological or interpretivist, which assumes that people create and associate their own subjective and intersubjective meanings as they interact with the world (Orlikowski et al., 1991). It is necessary to examine both philosophical approaches before deciding which to choose to carry out research for this study.
The positivist paradigm is well-known as being scientific and quantitative whereas the interpretivist or phenomenological paradigm is known for its non-positivist and qualitative approach. Positivist and interpretivist paradigms have their own advantages and disadvantages in different fields of research, however, both paradigms serve the same concern (Hussey & Hussey, 1997).

The positivist approach is to quantify and gather the data on a numerical basis in order to understand human behaviour. A major advantage is that it is prejudice-free in a sense, that is, one may attempt to re-examine the findings in different studies and in different contexts (Winfield, 1990). The positivist research paradigm reveals an understanding of human behaviours with the help of objective values. According to Saunders et al. (2007), the positivist paradigm is related to the facts and causes of social phenomena. In the positivist paradigm researchers use the language of theories, variables and hypotheses. Scientific in nature, the positivist paradigm deals with numbers in an objective form and use statistical methods for analysis. Statistical methods in quantitative research seek to explain and predict what happens in the social world by searching for reliability and casual relationships between its basic elements (Burrell et al., 1979 p.5). The positivist approach is far more reliable in studies when the objective of the research is to gather data related to the regularity of occurrence of phenomena. The aim is to develop applicable and reliable methods of obtaining ‘facts’ about society that can then be statistically analysed in order to produce substantiated explanations about how the social world operates (Gilbert, 2001 p.32).

The contrasting philosophical paradigm of the research is based on the qualitative view, which is concerned with descriptive data-gathering for understanding human behaviour. The qualitative approach is generally known as a phenomenological, subjective, and interpretive and non-positivist approach to reality. The qualitative method is used to gain a deep understanding of human behaviour regarding people’s values, belief systems, and interpretive schemes (Cavan et al., 2001). The phenomenological approach tries to explain the actuality in a descriptive manner as it is perceived by participants describing meaningful actions (Baroudi, 1991). Data collection by application of this method is considered to be an alternative to the positivist paradigm approach (Robson, 1993). Interpretive philosophy has the potential to produce insight into social science. However, there is a strong argument that what can be discovered in the interpretivist approach is not generalisable to large populations.
and has minimal application (Winfield, 1990). Positivist and interpretivist or phenomenological paradigm approaches are summarised in following table:

<table>
<thead>
<tr>
<th>Approach</th>
<th>Description</th>
<th>Source</th>
</tr>
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<tbody>
<tr>
<td>Positivist</td>
<td>With respect to knowledge, the epistemological belief of the positivist perspective is concerned with the empirical testability of theories. Positivist research works in a deductive manner to discover unilateral, causal relationships that are the basis of generalised knowledge, which can predict patterns of behaviour across situations.</td>
<td>Chua, 1986</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Baroudi, 1991</td>
</tr>
<tr>
<td>Interpretivist</td>
<td>The interpretive perspective emphasises the significance of subjective meanings, social-political and symbolic action in phenomenological processes through which humans construct and reconstruct their reality.</td>
<td>Baroudi, 1991</td>
</tr>
</tbody>
</table>

Figure 8 Summary of two philosophical paradigms

The description of the two traditions reveals their pure forms and shows that they are not only different but are also mutually exclusive (Gilbert, 2001). In terms of philosophical stance, the positivist paradigm applies a deductive method starting with the development of hypotheses and data collection. The interpretivist approach follows induction, the process of finding a case, observing the relationship and finally building up a theory to cover all cases (Baroudi, 1991). According to Cavana et al. (2001), quantitative design begins with supporting the theory, developing the hypothesis, gathering and analysing data, and then accepting or rejecting the hypotheses. However, an interpretivist research method begins with observation phenomena, analysing patterns and themes, formulating relationships, and then developing a theory, support for the theory, and developing hypotheses (figure 9).
Literature suggests that research methodology has a related philosophy within the different schools of thought. Fundamentally, the rationale behind the research approach is to develop valid and reliable facts from society. However, John (1994) and Easterby et al. (1991) observed other characteristics as well as those which demonstrated in Figure (08) A study of both paradigms highlights the fact that both methods have strengths and flaws, for example, the positivist method is faster, more economical, value free and can cover an extensive choice of population; however, the data collection method is rigid. In the interpretivist paradigm, data collection appears to be more realistic and offers an easy interpretation of people’s thoughts and meanings. As far as weaknesses are concerned it needs a greater source of data to be substantiated, is tedious in nature, and biased with generalisation problems coupled with context dependence (John, 1994; Robson, 1993). In terms of analysis and interpretation this paradigm is comparatively more complicated than the positivist approach.
<table>
<thead>
<tr>
<th>Theme</th>
<th>Positivist paradigm</th>
<th>Interpretivist paradigm</th>
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<tr>
<td><strong>Basic belief</strong></td>
<td>Objective and singular, apart from the researcher.</td>
<td>Subjective and multiple. World is socially constructed.</td>
</tr>
<tr>
<td></td>
<td>The researcher is independent of what being researched.</td>
<td>The researcher interacts with what is being researched.</td>
</tr>
<tr>
<td></td>
<td>Value-free and unbiased</td>
<td>Value-laden, biased and derived by humans</td>
</tr>
<tr>
<td></td>
<td>Based on set definitions. Impersonal use of accepted quantitative words.</td>
<td>Evolving decisions, personal voice. Use of accepted qualitative words.</td>
</tr>
<tr>
<td></td>
<td>Cause and effect. Paradigm looks for causality and fundamental laws.</td>
<td>Mutual and simultaneous shaping. Attempts to recognise what is to happen.</td>
</tr>
<tr>
<td><strong>Research should</strong></td>
<td>Reduce phenomena to simplest elements.</td>
<td>Glance at totality of each situation.</td>
</tr>
<tr>
<td></td>
<td>Prepare hypotheses and test them.</td>
<td>Build up ideas through initiation from data.</td>
</tr>
<tr>
<td></td>
<td>Deductive process</td>
<td>Inductive process</td>
</tr>
<tr>
<td><strong>Chosen method of research</strong></td>
<td>Static design categorisation isolated before study.</td>
<td>Emerging design categorisation identified during research process.</td>
</tr>
<tr>
<td></td>
<td>Context-free</td>
<td>Context-bound</td>
</tr>
<tr>
<td></td>
<td>Operationalise single concept in order to measure</td>
<td>Using many methods to establish range of views on the observable fact.</td>
</tr>
<tr>
<td></td>
<td>Generalisation leading to prediction, explanation, and understanding.</td>
<td>Patterns and theories developed for understanding. Limited generalisation.</td>
</tr>
<tr>
<td></td>
<td>Accurate and reliable through validity and reliability</td>
<td>Accurate and reliable through verification.</td>
</tr>
</tbody>
</table>

Table 7  Crux of positivist and interpretivist paradigms

*Source: (Creswell, J. W: 1994)*

The research philosophy in social sciences and business management studies depends on the ontology, epistemology, human nature, and the research assessment tool that relates to facts, the link between life facts and the researcher, and the tools applied by the researcher to examine reality (Healy & Perry, 2000). Epistemology is concerned with what acceptable knowledge is formed in a field of study and it also states the relation of the researcher to what is being researched (Saunders et al., 2007).
Ontology tells us the nature of the reality. Ontology has two aspects namely, objectivism and subjectivism. Ontology describes the objective and the subjective nature of reality (Saunders et al., 2007). Ontological beliefs are concerned with the essence of the phenomena under investigation; that is, whether the empirical world is assumed to be objective and hence independent of humans, or subjective and hence exists only through the actions of humans in creating and recreating (Baroudi, 1991).

In this work the researcher discussed the paradigms of positivism and interpretivism and their nature. Positivism is based on an ontological assumption of the world which is external and objective, whereas epistemology is based on the belief that observers are independent. In the social sciences there are four assumptions of both objective and subjective paradigms (Burrell & Morgan, 1979). Ontological assumptions concern the very nature or essence of the social phenomena that need be probed. In this supposition, a nominalist looks at social reality while an objectivist is in a realist position. In epistemology, there is a consideration that the researcher is concerned with the nature and forms of reality. On the other hand, the subjective approach is based on the experience and insight of personal experience whereas the objective approach is observable and a more difficult approach in the research sphere. The third assumption is human nature in relationship to human beings and the environment.

The subjectivist approach considers individuals as initiators or volunteers, while objectivists portray their environment as determinist (Baroudi, 1991). Likewise, the issues attached to measurement and identification also have different parameters for the two research paradigms. The subjective approach attempts to recognise individual behaviour that may be considered as ideographic while the objectivist approach seeks methods and procedures that may be devised to identify a general law and is referred to ‘nomothetic’ (John W. Creswell 1994). A final summary of the different research methods that influence the choice of methodologies is presented below:
Summary of social science research traditions

<table>
<thead>
<tr>
<th>Subjective approach</th>
<th>Objective approach</th>
</tr>
</thead>
<tbody>
<tr>
<td>Nominalism</td>
<td>Ontology</td>
</tr>
<tr>
<td>Anti-positivism</td>
<td>Epistemology</td>
</tr>
<tr>
<td>Voluntarism</td>
<td>Human nature</td>
</tr>
<tr>
<td>Idiographic</td>
<td>Methodology</td>
</tr>
</tbody>
</table>

Source: Cohen et al. (2000 p.7)

Types of business research

Research in organisations is generally undertaken for two separate rationales. One is to find a solution for current problems faced by management in work settings, demanding well-timed attention. For example, perhaps a particular section in an organisation is not providing a satisfactory service and the administration wants to know the causes in order to be to take corrective steps; such research is called ‘applied research’.

Basic research produces a body of knowledge by attempting to understand how specific predicaments that happen in organisations can be dealt with (Sekran, 2006).

Basic research is grounded firmly in the experimental method and has its objective in the creation of new knowledge of how fundamental processes work. Applied research is also grounded in the experimental technique, but it applies scientific methodology to develop information with the aim of clarifying and confronting an immediate social problem. Some of the fundamental differences in purpose of applied and basic research approaches are listed as follows:
### Contrast of purpose

<table>
<thead>
<tr>
<th>Basic</th>
<th>Applied</th>
</tr>
</thead>
<tbody>
<tr>
<td>Develop universal knowledge</td>
<td>Understand/address problem</td>
</tr>
<tr>
<td>Answer a single question</td>
<td>Answer multiple questions</td>
</tr>
<tr>
<td>Discover statistically significant relationships or effects</td>
<td>Discover practically significant relationships or effects</td>
</tr>
</tbody>
</table>

### Contrast of context

<table>
<thead>
<tr>
<th>Basic</th>
<th>Applied</th>
</tr>
</thead>
<tbody>
<tr>
<td>Academic</td>
<td>Government, business/industrial settings</td>
</tr>
<tr>
<td>Single discipline</td>
<td>Multidisciplinary</td>
</tr>
<tr>
<td>Laboratory or class</td>
<td>Field</td>
</tr>
<tr>
<td>Lower cost sensitivity</td>
<td>Higher cost sensitivity</td>
</tr>
<tr>
<td>Less time pressure</td>
<td>More time pressure</td>
</tr>
<tr>
<td>Funded by grants</td>
<td>Funded by contracts</td>
</tr>
</tbody>
</table>

### Contrast of methods

<table>
<thead>
<tr>
<th>Basic</th>
<th>Applied</th>
</tr>
</thead>
<tbody>
<tr>
<td>Internal validity</td>
<td>External validity</td>
</tr>
<tr>
<td>Construct of cause</td>
<td>Construct of effect</td>
</tr>
<tr>
<td>Single level of analysis</td>
<td>Multiple levels of analysis</td>
</tr>
<tr>
<td>Single method</td>
<td>Multiple methods</td>
</tr>
<tr>
<td>Experimental design</td>
<td>Quasi-experimental designs</td>
</tr>
</tbody>
</table>

*Source: Hedrick et al., 1993*
4.1 Research Approach

This study examines the relationship between independent and dependent variables. At the start of the study, the researcher presented an extensive review of the literature and developed a theoretical model for empirical examination. With the help of this conceptual model and the organisational behaviour and job attitude literature, the researcher developed hypotheses to examine the relationship between independent and dependent variables. The researcher followed a quantitative approach to collect the data and carry out the analysis. According to Baroudi (1991), the positivism paradigm applies a deductive method starting with the hypotheses. Hussey & Hussey (1997 p.55) explain that, within the positivist paradigm, the plan is to study the literature, establish the appropriate theory and create the hypotheses. The rationale behind the quantitative approach for this study is to measure the relationship between the variables. Second, the ontological perspective suggests the realist position, which requires social facts. Epistemologically, this allows independent observable facts in society. The methodological issue relates to measurement and the recognition of underlying themes related to the objectivist approach in this study. The objectivist approach is related to procedures and methods that work to discover a general law and are referred to as ‘nomothetic’.

This research is built upon an empirical study in which a survey questionnaire has been distributed among a sample population in order to gather data for the study. This study was carried out in public organisations in Pakistan and the data was collected from general practitioners (medical doctors) in public hospitals. In order to analyse the data, statistical measures were used to test the hypotheses and examine the relationship between the independent and dependent variables. A pilot study was performed before the full study to check survey instrument reliability, language, and time limits for completing the survey.

4.2 Application of the quantitative method

The appropriate tool to determine and assess attitude data is predetermined instrument-based questions (Creswell, 2003). In this work the researcher has identified different variables and the aim is to identify and study the relationship of these variables to the dependent variable of
job satisfaction of public employees. The quantitative approach is an appropriate strategy to study this kind of relationship (Creswell, 2003).

In the study of research methods the quantitative method expresses the assumptions of the positivist paradigm that tells us that behaviour can be described through objective facts. As has been stated earlier, this study aims to determine the correlation of identified variables to the dependent variable of job satisfaction and measure the effect of those variables on public employees’ job satisfaction. The quantitative method is supportive in studies where some kind of explanation is sought to describe the cause of change in social facts, basically through the means of objective measurement and quantitative analysis. Therefore the researcher considers the quantitative survey method to be an appropriate tool for assessing the attitude of employees towards their work.

This study of public employees’ job satisfaction will assess the impact of the identified variables on employees’ level of satisfaction at work and understand the change caused by these identified variables in the dependent variable of job satisfaction (William, 2005). This study is correlational and will attempt to understand and examine the impact of identified variables on public employees’ job satisfaction. Perhaps there are several other factors that might be linked to employees’ job satisfaction. However, this study only attempts to assess the identified variables’ variance to public employees’ job satisfaction. However, this study only attempts to assess the identified variables’ variance to public employees’ job satisfaction (Uma sekran 2006). The quantitative method is a more powerful tool to calculate the magnitude of the relationship with added accuracy. Since this study is measuring the effects of different variables on the dependent variable and attempts to assess the level of relationship of different variables to the dependent variable of job satisfaction, the quantitative method of data collection will be the appropriate tool for this study to check the precise impact of different variables on the dependent variable (Boyt et al., 2001).

4.2.1 Validation for Quantitative Method

The importance of job satisfaction lies in its stabilising effects such as reducing tardiness, absenteeism, and turnover; consequently these stabilising factors are linked to employees’ job satisfaction. The literature supports the assumption that the main issues have been attitude, perception, and beliefs when determining job satisfaction. Hence it might be argued that job
satisfaction has some kind of link to employee performance. Secondly, job satisfaction mediates the effects of role performance, role conflict and job-related tension (stress).

In most instances it is true that satisfied employees are more productive, effective (helpful), efficient (good at job), and committed to their employers. Recent research data indicates a direct correlation between staff satisfaction and client satisfaction (Caprara et al., 2006). Employers who create an atmosphere that catches the attention of (attracts) employees, motivates and retains hard-working individuals, will be better positioned in an environment that demands quality and is cost-effective. Cost-efficiency is an important factor because if costs are higher than the benefits then no action will take place. In addition, the employers, by creating a positive work place atmosphere, not only increase their employees’ job satisfaction but their own satisfaction also. Professional and competent management means motivated and neutral employees who are dedicated to serving the interests of the public. In order to have professional management who are cost-conscious, it is imperative to study employee work-related well-being and evolve strategies that minimise employee job stress and enhance their job satisfaction. According to human relations theory, workers who are satisfied will automatically become effective and productive. However, the relationship between satisfaction and productivity has been acknowledged as much more complex.

In the domain of employee job attitude, job satisfaction has been linked with organisational factors and employee attitudes towards job satisfaction (Jonson et al. 2003; Bradley et al., 2003). Employees can have a number of reactions in the absence of job satisfaction such as less productivity, absenteeism, turnover and withdrawal behaviour (Brunetto et al., 2002). Consequently, researchers are keen to determine the predictors that might help to improve employee job attitude such as job satisfaction in the recent past; a number of factors have been identified as predicting employee job satisfaction. A survey questionnaire was used to sample 4,000 municipal employees in Israel to determine employee job satisfaction attitudes focusing on organisational factors such as organisational justice, work conditions, training opportunities; it found a significant impact on employee job satisfaction levels (Vigoda et al., 2008). In Australia, with a sample consisting of 384 participants from the professions of nursing, police, and federal government, Brunetto et al. (2005) found that the perception of fairness and working conditions are related to employee job satisfaction. Examining 251 survey samples from nursing professionals in Pennsylvania, USA, Castle et al., (2006) found that justice perception, team spirit, individual psychology, and working conditions significantly and positively related to predict employee job satisfaction. In other recent
studies, Nobel et al. (2005), using questionnaires from a sample of 407 public sector employees, found a significant relationship between employee psychological health, organisational policies and job satisfaction.

The literature findings above suggest that organisations need to examine organisational factors and employee psychological needs regarding employee job satisfaction. In order to examine employee job satisfaction and employee job satisfaction predictors, the majority of researchers used survey questionnaires. Job satisfaction of employees and its determinants are measured using the positivist approach by the majority of researchers. In organisational behaviour and organisational psychology literature, the survey method is frequently used (table 8).

<table>
<thead>
<tr>
<th>Title</th>
<th>Author</th>
<th>Sample size</th>
<th>Instrument applied</th>
</tr>
</thead>
<tbody>
<tr>
<td>How satisfied are nursing home staffs?</td>
<td>Anderson et al., 1991</td>
<td>212</td>
<td>Questionnaire</td>
</tr>
<tr>
<td>Long-term care nursing: how satisfying is it?</td>
<td>Deckard et al., 1986</td>
<td>340</td>
<td>Questionnaire</td>
</tr>
<tr>
<td>Job commitment and turnover among women in facilities serving older people</td>
<td>Kiyak et al., 1997</td>
<td>308</td>
<td>Questionnaire</td>
</tr>
<tr>
<td>Satisfaction of nurse managers in long-term care</td>
<td>Gillies et al., 1996</td>
<td>44</td>
<td>Questionnaire</td>
</tr>
<tr>
<td>Job satisfaction of nurses employed in rural and urban long-term care facilities</td>
<td>Coward et al., 1995</td>
<td>281</td>
<td>Questionnaire</td>
</tr>
<tr>
<td>The impact of number of a range of Australian public sector employees</td>
<td>Brunetto et al., 2005</td>
<td>384</td>
<td>Questionnaire</td>
</tr>
<tr>
<td>Determinants of staff job satisfaction of caregivers in Pennsylvania</td>
<td>Castle et al., 2005</td>
<td>251</td>
<td>Questionnaire</td>
</tr>
<tr>
<td>Keeping teachers happy: job satisfaction among primary school teachers in rural China</td>
<td>Sargent et al., 2003</td>
<td>1,231</td>
<td>Questionnaire</td>
</tr>
<tr>
<td>Treating employees fairly and organisational citizenship behaviour: sorting the effects of job satisfaction, organisational commitment and procedural justice</td>
<td>Moorman et al., 1993</td>
<td>230</td>
<td>Questionnaire</td>
</tr>
<tr>
<td>Which work characteristics predict employee outcomes for the public sector employee? An examination of generic and occupation-specific characteristics</td>
<td>Nobel et al., 2005</td>
<td>199</td>
<td>Questionnaire</td>
</tr>
<tr>
<td>Determinants of job satisfaction of municipal government employees</td>
<td>Ellickson et al., 2001</td>
<td>1,227</td>
<td>Questionnaire</td>
</tr>
</tbody>
</table>

Table 8 Survey Based studies
According to Baroudi (1991) Positivist approach is with regard to knowledge, the epistemological belief of the positivist perspective is related with the empirical testability of theories. Positivist research functions in a deductive manner to determine independent, causal relationships that are the core of generalised knowledge, which can envisage patterns of behaviour across situations. While substitute approach to positivist is interpretive philosophy that works and attempts to explain an insight from social sciences perspective.

Nevertheless, there is a strong argument that what can be determined in the interpretivist approach is not generalisable to large populations and has insignificant application (Winfield, 1990). Positivist school of thought t mainly sponsors value-free (i.e., objective) natural sciences methods to review social reality and beyond (Bryman & Bell, 2003). Based on strictly applicable procedures, it is considered as a one-way illustration of inquiry in which researcher and researched object are believed to be independent entities without affecting each other (Guba & Lincoln, 1985). Opposing to objectivism, the method of analysis within interpretivism is identified as ‘qualitative’, in which concepts are not classified into small chunks of variables, but are expanded and elaborated into theories (Creswell, 2003). The choice of a positivist approach is based on the nature of the problem referred and preceding literature in employee job attitude and human resources management domain. Methodologically the positivist approach exercises to examine rational using a deductive process (Hussey & Hussey, 1997) which is mainly depicted through: 1) the design of hypotheses, models, or causal relationship within constructs, 2) the possible application of quantitative methods to assess relationships, and 3) the researcher’s value-free analysis objective. Baroudi & Orlikowski (1991) in their meta-analysis recognised studies as positivist if they were established on prior fixed relationships, quantifiable measures of variables, hypothesis analysis, and derived inferences about phenomenon from the sample to a specified population. The basic objective of this research is to explore the predictors of an individual’s job attitude that are established through the influence of perceived work attributes and personality disposition. Hence, from an ontological perspective, the positivist approach matches the existing study.

In the present study, Chua's (1986) criteria for implementing a positivist approach can be viewed by viewing the eventual goal of the study is to observe the constructs of Organisational work attribute and personality disposition to determine employee job satisfaction. Consequently the goal requires a conceptual framework with a clearly defined number of constructs and their relationships (i.e., independent or dependent). In doing so, the
literature review in chapter 2 discloses that a significant number of theories and models are offered within the domain of employee job attitude and behaviour for exploring the numerous objectives of employee job satisfaction (see literature review). As a result, developing a conceptual model with justifications (Creswell, 2003) to attain the objective of this study is achievable. There is wide-ranging and current literature present within the domain of employee job satisfaction to explore the constructs and their relationship(s). Hence adopting alternative approach will not only consumption time, money and effort but also compromise principled subjectivity of the research objective. The purpose of this research is essentially based on objectivism and there is little or no interference expected by the researcher on the researched problem, thus adopting an alternative research approach is unjustifiable.

In the positivist research paradigm a survey instrument applies Likert scaling to measure employee job attitudes which has satisfactory reliability and a greater choice of answers for respondents (Miller et al., 2003; Oppenheim, 1992).

The purpose of this study is to examine organisational factors, and employee psychological attitudes and behaviours towards job attitudes such as job satisfaction. The quantitative approach is selected for this purpose because this approach is one of the most widely used approaches in the field of business management and human resource management to predict employee job attitude. The quantitative approach concentrates on what, where, and when of beliefs in determining employee attitude and this will address the following questions of the researcher’s study:

1. What impact do the organisational work attributes factors have on employee job attitude to determine employee job satisfaction?

2. What influence the employee personality disposition factors have on employee level of job satisfaction?

3. What are the effects of employee job satisfaction in Healthcare public organisations?
4.3 Research Strategy

Research strategy is the general plan of how to answer the research questions (Saunders et al., 2007). There are many strategies which can be applied in the research such as experiments, surveys, case studies, grounded theories, ethnography and action research. What matters is which strategy is appropriate for the research question(s) and objectives chosen? (Sekran, 2006).

This research is an example of survey strategy in which questions are used to assess the respondent’s attitude. The items in the questionnaire measured the public employees’ (general practitioners) perception of organisational factors, their feelings of self-esteem, self-efficacy and job attitudes.
4.4 Research Design

This research aims to understand and examine the independent variables such as justice perception, team spirit, and job training satisfaction, self-efficacy belief, and employee self-esteem with the dependent variable of job attitude. At the beginning the literature was extensively reviewed in the domain of employee job attitudes such as job satisfaction and a gap was identified. It was observed that organisational attributes such as justice perception, working conditions, and employee psychology traits can develop employee job attitudes. From this point of view the researchers have empirically tested these factors and found a positive impact on employee job satisfaction in public organisations. (Adams et al., 2000; Moorman et al., 1993). Public employees are characterised as being influenced by self-sacrifice, compassion, public policy involvement and public service motivation. However, these characteristics are not enough to understand public employee job attitudes such as job satisfaction (Bright, 2008). This creates a gap in the literature and this study is based on this gap; with the support of the literature it identified other variables than those stated above to examine public employees’ motivation.

This research has been conducted in health organisations of Pakistan where employee motivation is a very important need for employees because it will have an impact on the general public who are the clients of general physicians (Caprara, 2006). The research design is based on the assumption that research is an interrelated sequence of steps. The successful completion of one step in the sequence is dependent on the successful completion of the preceding step (John, 2004; Sarantakos, 1993). The research design facilitates the depiction of the limits for the study by identifying the study settings, the type of inquiry to be taken up, the unit of analysis and other matters concerned with the research (illustration 1). However, the research process can only be successful if the researcher makes the right application of research design (Robson, 1993).

The research design applied in this study is based on the deductive method. The hypotheses are developed and the strategy is developed to test these hypotheses (Sekran, 2006). The deductive method broadly divides research design into a series of elements which leads towards answering the research questions (Sekran, 2010).
The research design describes the hypothetical method that answers the research question and justifies the hypothesis developed on the basis of literature and conceptual framework (John, 2004). The deductive method, which involves hypothesis development, divides research design into a chain of steps to answer research questions. The research process began with a detailed review in order to understand the research domain of job attitudes. On the basis of the reviewed literature, a research gap is identified and a conceptual model was developed for this study. In the conceptual model the study has been divided into three major groups. The first is organisational characteristics such as justice perception, training, team spirit, working conditions; the second group consists of employee psychology factors such as self-esteem, employee self-efficacy belief, and neuroticism; finally, in the third group the employee demographic is depicted. In the conceptual model all these factors are combined with regard to the understanding of employee job attitude such as employee job satisfaction. To test the hypotheses and examine the model, data is necessary. Data type is ascertained as quantitative, an epistemological stance is established, and the research scheme is recognised.

In light of the above summary, the researcher adopted a positivist paradigm approach for data collection purposes. According to Chua (1986), in this paradigm an extensive literature review is involved and the development of hypotheses on the basis of the conceptual framework. In the positivist paradigm of research philosophy the survey instrument applies Likert scaling to measure employee job attitude because the reliability of this scale is supposed to be good and allows a range of options for respondents to express their views (Baroudi, 1991; Saunders et al., 2007). In Likert scaling the respondents are asked how strongly they agree or disagree with the statement or series of statements. This type of rating scale is often used to understand and determine underlying attitudes (Saunders et al., 2007; Sekran, 2010).
Figure 10 Research design process

*Source: developed by the researcher*
4.5 Research Instruments and Measurement Scale

This study used survey instruments to collect data from its targeted sample of population. The targeted sample was medical officers, male and female, working in district public hospitals in Pakistan. In the field of employee job attitudes, the number of research studies used survey instruments to collect the data. Sargent et al. (2003) examined the employee job satisfaction of teachers by examining the impact of work conditions, job demands, and social problems. Ellickson et al. (2001), in their study on the determinants of job satisfaction of municipal government employees, used questionnaires to explain team spirit, working conditions and training impact on employee job satisfaction. Similarly, Nobel et al. (2005), in a study of which work characteristics predict employee outcomes for public sector employees that examined generic and occupation-specific characteristics, applied the survey instrument. All these researchers used the survey as a reliable way to collect data for specific variables of researcher interests (Hussey & Hussey, 1997). The survey instrument strategy is linked with the deductive approach. It is one of the most widely used strategies in the domain of business studies and employee behaviour. This strategy allows the researcher to collect data that can be analysed by descriptive inferential statistics (Saunders et al., 2007). Survey techniques to collect the data assist the establishment of a relationship between variables and to produce the model of a relationship which is the purpose of this study (Sekran, 2010). The survey method attempts to understand the perception of a selected group in terms of what they think, perceive, feel or do. This serves the purpose of this study, which is to understand the perception of employee job attitude (Verschuren et al., 1999).

4.6 Questionnaire Instrument Development

The survey instrument for this study was developed on the basis of the information required to examine the research question. This study adopted a positivist paradigm which relates to the development of hypotheses and the examination of those hypotheses. In order to examine the hypotheses of a study a survey instrument is applied for data gathering. A survey instrument helps to examine the underlying attitudes of employees regarding different work characteristics and provide insight into employee job attitude (Saunders et al., 2007). The positivist philosophy, as discussed earlier, allows use of the survey instrument method of data collection to examine employee job attitude such as job satisfaction. As a result this study
used the questionnaire survey method for data collection with the many options of Likert scaling for the respondents.

This study spotlights the work, organisation characteristics and employee personality aspects that can support management to develop policies to improve employee job attitudes and motivation levels. An employee’s motivational levels and job attitude can be developed by improving employee perceptions of work characteristics and fulfilling employee personality aspect needs such as efficacy belief, organisational justice and work characteristics. In this respect a model has been developed by employing work characteristics (procedural justice, training, esprit de corps, job clarity, and working conditions) and employee personality aspects (self-efficacy belief, employee self-esteem and neuroticism) to know employee behaviour and attitude for job satisfaction.

The study for this purpose is carried out on a cross-sectional basis which depends on a one-time data collection from the sample to examine the hypotheses. The survey questionnaire used in this study has four parts.

Section one is concerned with information about the demography of the participants. This provides data about the participants’ personal profiles. Five items from questions one to five are about personal profile demography information. These variables (i.e., gender, age, marital status, length of service, academic qualification) have been applied in order to understand the impact on employee job satisfaction. Many researchers such as Solman (2005) and Miller (2009) examined demographic factors to understand employee job satisfaction.

Section two of the survey consists of nine items (6 to 14) and provides information about the participants’ views on employee job satisfaction. The questionnaire items have been applied from the scale developed by Warr et al., (1979) to measure work attitudes. The reliability of these items found .80 in previous research. The information gathered using this scale provides information on employees’ attitudes to their levels of job satisfaction.

Section three of the survey consists of 26 items (15 to 40) which provides information about employee perceptions of different work characteristics. Survey questions from 15 to 20 are relevant to employee perceptions of procedural justice in organisations. All these items measure employee perceptions of justice and fairness in the organisation. The items of procedural justice perception adopted in this study are from the study of Niehoff et al. (1993)
and used by various other researchers such as Moorman et al. (1993) in the study of job attitude and Kim et al. (2004) in the study of behaviour to measure justice perception.

Questions 21 to 27 measure the impact of working conditions on employee job attitude. These items were developed by Quinn et al. (1974). This scale obtains information about respondent views about levels of comfort in the workplace, security, availability of physical space and the workplace environment. Adopted items of working conditions are used by numerous other studies such as Abu-Bader (2000) in a study of work satisfaction among social workers in Israel. Martinussen et al. (2001) examined job attitudes among police officers, and Soleman (2005) studied ethnicity and job satisfaction among social workers.

Questions 28 to 32 measure the impact of training on employee job satisfaction. The items were adopted for this scale from Schmidt (2007). The scale of employee job training satisfaction measures different aspects of training which is provided to employees during the job. Questionnaire item numbers starting from 33-36 measure the task significance relationship to determine employee job satisfaction. The items for this scale were taken up from the task significance scale of Campion et al. (1993).

Questions 37 to 40 are related to the construct of *esprit de corps*, which comprises four items and is adopted from Bernard & Kohli (1993). Job clarity is measured by questions 41 to 44 which consist of four items.

Section four consists of 29 items (45-73). This section provides information about employee personality aspects. Question items from number 45 to 53 were about employee locus of control orientation adopted from Levenson 1974. Questions 53 to 60 were related to employee self-esteem. Question item for this construct developed by Rosenberg (1965) applied in numerous studies like Davis et al (2009) and Hatcher et al (2009) to measure employee self esteem. Questions from 61 to 67 with six items, measures employee self-efficacy belief. The scale used in the study was developed by Chen & Eden (2001) and used by many other researchers as well, such as Oreg (2003) and Chia (2009) to measure self-efficacy belief impact on employee job attitude such as job satisfaction.

Questions 67 to 73 measure employee neuroticism levels with the measure developed by Eysenck & Eysenck (1968). Five items are adopted from this scale to assess employee neuroticism levels. Neuroticism predicts employee emotional stability levels across a number of situations. The scale is used by other studies such Judge et al. (1998) and Srivastava et al. (2010) to measure employee neuroticism levels in relation to personality aspects.
The survey instrument consists of 55 items adopted from different reliable and validated studies. All items are linked to study variables and have been developed to test the hypotheses. Most of the items in the instrument measure and test hypotheses of study however; some items are included to collect demographic information (Table. 9).

<table>
<thead>
<tr>
<th>Hypothesis</th>
<th>Variable</th>
<th>Relevant questions</th>
</tr>
</thead>
<tbody>
<tr>
<td>Profile information</td>
<td>Demography</td>
<td>1-5</td>
</tr>
<tr>
<td>Employee job satisfaction</td>
<td>Job satisfaction</td>
<td>6-14</td>
</tr>
<tr>
<td>H1: Perception of procedures is significantly and positively correlated to employee job satisfaction</td>
<td>Procedural justice</td>
<td>15-20</td>
</tr>
<tr>
<td>H3: There is significant and positive correlation between working conditions and employee job satisfaction</td>
<td>Working conditions</td>
<td>21-27</td>
</tr>
<tr>
<td>H2: Job training satisfaction is positively is positively correlated to employee job satisfaction level</td>
<td>Job training</td>
<td>28-32</td>
</tr>
<tr>
<td>H6: Perception of task significance is significantly correlated with employee job satisfaction</td>
<td>Task significance</td>
<td>33-36</td>
</tr>
<tr>
<td>H4: There is significant and positive correlation between <em>esprit de corps</em> and employee job satisfaction.</td>
<td><em>Esprit de corps</em></td>
<td>37-40</td>
</tr>
<tr>
<td>H5: There is significant and positive correlation between job clarity and employee job satisfaction.</td>
<td>Job clarity</td>
<td>41-44</td>
</tr>
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<td>H8: Employee locus of control orientation is significantly correlated with employee job satisfaction</td>
<td>Locus of control</td>
<td>45-52</td>
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<td>H9: There is positive and significant relationship between employee self-esteem and employee job satisfaction</td>
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<td>53-60</td>
</tr>
<tr>
<td>H7: Employee self-efficacy belief is positively and significantly correlated to employee job satisfaction</td>
<td>Self-efficacy</td>
<td>61-66</td>
</tr>
<tr>
<td>H10: Neuroticism trait is significantly and negatively correlated to employee job satisfaction.</td>
<td>Neuroticism</td>
<td>67-73</td>
</tr>
</tbody>
</table>

Table 9 Survey questionnaire items and information about relations with hypotheses and Variables
4.6.1 Measurement Scales

In this study, independent and dependent variables are taken up by the positivist research paradigm to measure employee attitudes, personality aspects, behaviour, and perceptions regarding job attitudes such as job satisfaction. Employee job satisfaction is the dependent variable of the study and workplace characteristics and employee personality aspects are applied in this study to predict employee job satisfaction. Workplace characteristics such as procedural justice, job training, *esprit de corps*, working conditions, and job clarity are the independent variables of the study. The employee personality aspects such as self-esteem, self-efficacy belief, and neuroticism are also examined in this study as independent variables to predict employee job satisfaction. In addition, other variables such as gender, age, academic qualifications, length of service, and marital status were collected for demographic information. The scales used in this study are adapted from previous studies to measure employee perceptions of workplace characteristics, personality aspects, and employee job satisfaction. These scales were tested with the help of a pilot study in the first instance to examine their reliability and validity. The rationale for doing a pilot study before the full-scale study was to identify any loopholes, poor wording, and time to complete the survey instrument. After gathering all the relevant information and measuring reliability and validity tests, finally the questionnaire was ready to be sent to general physicians working in district public hospitals in the region of southern Pakistan.
4.6.2 Independent Variables

To examine employee job attitude, the following work characteristics and personality aspects were selected for this study.

**Procedural justice:** A six-item scale developed by Niehoff et al. (1993) with a seven-point Likert scale (strongly disagree to strongly agree) was applied in the study.

**Working conditions:** A seven-item scale measured working conditions developed by Quinn et al. (1974) by means of a seven-point Likert scale (strongly disagree to strongly agree) was applied.

**Job training:** A four-item scale was developed to measure employee job training satisfaction and its impact on employee job satisfaction. The scale used in the study, developed by Schmidt (2007) to measure job training by means of a seven-point Likert scale (strongly disagree to strongly agree) was applied.

**Task significance:** Task significance, measured with the support of a four-item scale developed by Campion et al (1993) with a seven-point Likert scale (strongly disagree to strongly agree) was applied in the study.

**Esprit de corps:** A four-item scale developed by Bernard & Kohli (1993) by means of a seven-point Likert scale (strongly disagree to strongly agree) was applied in study.

**Job clarity:** Job clarity, measured with the help of a four-item scale developed by Rainey (1983) with a seven-point Likert scale (strongly disagree to strongly agree) was applied in the study.

**Locus of Control:** Eight item scale developed by Levenson (1974) with seven option scale (strongly disagree to strongly agree) used in this study.

**Self-esteem:** A five-item scale developed by Rosenberg (1965) with a seven-point Likert scale (strongly disagree to strongly agree) was applied in the study.

**Self-efficacy Belief:** A six-item scale developed by Chen & Eden (2001) with a seven-point Likert scale (strongly disagree to strongly agree) was applied in study.

**Neuroticism:** The emotional stability level was measured with a scale developed by Eysenck & Eysenck (1968) with a seven-point Likert scale (strongly disagree to strongly agree).
4.6.3 Demography Variable

In the demographic section of the instrument personal profile information is sought from the participants of study. The demographic section includes gender, age categorisation, marital status, length of service, and academic qualifications. The respondent will be directed to tick the designated box in the demographic section to provide this information.

4.6.4 Dependent Variable

A nine-item scale applied for the measurement of the dependent variable of employee job satisfaction. This scale, developed by Warr et al. (1979), was also applied by Nikolaou et al. (2001) and was used to measure respondents’ views regarding their job satisfaction. Respondents were given the choice to select one of seven options on a Likert scale (1=strongly disagree and 7=strongly agree).

4.7 Data Triangulation

Data triangulation is an important and extensively applied strategy to make research findings accurate. According to Denzin (1978 p.291), triangulation is ‘the combination of methodologies in the study of the same phenomenon’. Data triangulation is a means to assist the reduction of data bias and increase the truthfulness of judgement. Triangulation is used to tackle all facets of the topic under analysis. It increases the amount of research data and helps accomplish a high level of validity, and to overcome the weaknesses of one method (Bryman & Bell, 2003). Data triangulation is the act or means of gathering data from more than one source with the purpose of validating the results with authenticity (Robson, 1993).

Data triangulation in the research is used by applying different techniques. Broadly, data triangulation has four major categories (data triangulation, observer triangulation, methodologies triangulation, and theory triangulation). Triangulation allows the use of multiple sources to highlight the viewpoints when examining a phenomenon under study (Robson, 1993).
Data triangulation denotes the employment of more than one form of data in a way to improve certainty in findings. In social and behavioural sciences research, it is realised as a resource of diminishing bias. Accordingly, it is imperative to retrieve more than one data that can support the object to handle the facts for suitable results. In existing research to make more consistent and validate findings, data triangulation was employed. The researcher utilised various sources of data like theory triangulation which signifies the same set of data from various perspectives. Therefore, the survey questionnaire applied in this research is covered in different sections which were correlated with required objects.

This questionnaire includes four sections which were construed with multiple perspectives like organisational work attributes and personality disposition relates to employee job attitude for job satisfaction. In addition, the researcher employed documents, newspaper archives and other written sources of data which could be synthesised to match with survey data. By employing these sources the researcher could increase the reliability and validity of findings.

In this study the researcher has applied theory triangulation to ensure the data is reliable and authenticate the data findings. This approach involves analysing the same set of data from several perspectives. Therefore, the survey instrument used consists of different sections that were correlated with study variables. The survey instrument comprises four sections which deduce different perspectives such as work characteristics, organisational justice, employee personality aspects and examines their relationship with employee job attitude for employee job satisfaction. The researcher used documents, newspaper archives and other written material that could be amalgamated to contrast with the survey data available to the researcher. Use of these sources by the researcher could enhance the reliability and validity of the findings.
4.8 Pilot study

The purpose of the pilot study is to refine the questionnaire so that respondents will encounter no problems when answering the questions and there will be no difficulties when recording the data (Sunders et al., 2007). Bell (2005) suggested that a pilot study is important to assess the following:

1- How long the questionnaire took to complete
2- The clarity of instructions
3- Which, if any, questions were unclear or ambiguous
4- Determine if there were any questions the respondents felt uneasy about answering
5- Whether there were any major topic omissions
6- Respondent felt there were any major topic omissions
7- Any other comments

The number of people contacted for the piloting of the questionnaire depends upon the research questions, the objective, and size of project (Sunders et al., 2007). The frequency of people contacted should be enough to include any major variations in the population which, as the researcher, can be considered as likely to affect responses. In most cases of student survey questionnaires, a minimum number of ten is considered sufficient for a pilot study (Fink, 2003). The pilot study is carried out to make certain that questions really measure what they are supposed to measure and that the questions are understood by all respondents in a similar way. Piloting also helps to ascertain that the questionnaire creates a good impression, that questions are answered correctly and respondents report any bias (Dillman, 1978).
4.8.1 Research Protocol Approach

In business research the analysis of the method of data collection was adopted to classify the mental processes of problem-solving. The purpose of the method is to uncover how people act and reflect their feelings in specific situations, primarily in explaining and sorting out a complex problem (Collis & Hussey, 2009). Research protocol is a definite set of rules arranged for a specific study. In business management research the protocol acts as an important instrument that can be applied to the literature review and new research. Research protocol may make it possible to have a smooth flow of study. In any research, protocol is one of the most difficult steps and needs to follow several steps such as introduction of study, aims and objectives, hypothesis, setting and then collection of sample, research methodology, statistical methods for data analysis, and scheduling of study (Holloway & Mooney, 2004).

4.8.2 Reliability and Validity

The credibility of the data collected by the researcher is related to the reliability of the data gathered. The reliability shows the adherence of the procedures, and focuses on the accuracy of the measurements and capability to reiterate the research. In the instance that the same procedure is to be done again, the outcome must be same. This is known as repeatability and consistency and will show reliability. The extent to which any research has the capacity to be replicated and the outcome of the research can be repeated determines the reliability of the research (Yin, 1994). Reliability is the extent to which data collection techniques will produce dependable findings that are similar to the conclusions of other researchers in the same study domain. Reliability may be affected by subject error, measurement bias, observer error and deliberate distortion. Subject error occurs due to pressure from authorities to show the results according their directions. Observer error is related to the structure of the instrument; similarly, observer bias is concerned with how the researcher examines the instrument, whereas deliberate distortion is recording data inaccurately on purpose. In business organisations managers sometimes deliberately fail to record minor accidents in order to improve health and safety reports, which are a case of deliberate distortion of data (Saunders et al., 2007).

In this study, the researcher has followed the positivist paradigm of research which is a very efficient way to collect data for specified variables of interest (Robson, 1993). The researcher
developed the survey instrument to get data from public organisation employees. The sample population was general physicians working as medical officers in southern Pakistan government hospitals at district level. Contact numbers and addresses were provided in the covering letter along with a questionnaire in case a participant came across any difficulties. Assurances were given to all participants of the study that the data would be strictly confidential and anonymity of the participants would be maintained. The study instrument was designed on the basis of the survey questionnaire and it did not face any observer error difficulties. The reliability of survey items could be measured with the help of the internal consistency method (Hussey & Hussey, 1997). In this study the researcher measured the internal reliability with the help of Cronbach’s alpha coefficient (α). The researcher approached senior experts as well to assess the reliability of the research instrument which is one effective way to check reliability (Saunders et al., 2007).

The validity of the research reveals the extent to which the results of the researcher findings represent what is actually happening in the world (Collis & Hussey, 2003). The validity of the research findings is established by internal and external sources. Internal validity is the level of confidence with which a researcher develops a phenomenon based on real life experience (Reige, 2003). External validity is the extent to which researcher findings can be generalised. In order to understand this, replication logic would be applied for the survey instrument study. External validity is the ‘the approximate validity with which we infer that the presumed causal relationship can be generalised to and across alternate measures of cause and effect and across different types of persons, settings, and time’ (Lincoln & Guba, 1985 p.291). A theory can be examined twice or many times and identical results should occur, which characterise replication (Yin, 1994; Lincoln & Guba, 1985). The validity of the research might encounter risk when the researcher draws incorrect conclusions from the sample data than in the other settings and past or future situations (Cresswell, 2003). Construct validity sets up the means for hypothetical concepts adopted in the study by the researcher in which it can be assured that constructs are in close proximity to their real life context (Yin, 1994).

In this study, the researcher has applied survey instruments for data collection whose validity is determined in two ways. First, whether the respondents replied correctly, and second, whether those who did not respond would have given the same distribution of replies as the returnees (Belson, 1986). The low validity problem in this study was tackled by applying the methods and theories used and examined frequently by prominent researchers (Bradley,
According to Saunders et al. (2007), generalisability is the extent to which conclusions can be drawn about one phenomenon based on the information drawn from another source. In the case that respondents fail to understand the survey information it will be characterised as a low validity of the survey instrument. In this study the researcher carried out the pilot study in the first instance and removed discrepancies like language errors as well as measuring the time limit.

4.9 Full-scale study

The researcher conducted a full-scale study after doing the pilot study which checked the reliability and validity of the research instrument and made sure that the instrument was free of discrepancies. The full-scale study was conducted amongst public employees of health organisations in Pakistan. The detail of population and sample, targeted sample population and data compilation is discussed in the next section.

4.9.1 Population Sampling

Population sampling denotes the process by which a group of representative individuals is chosen from the population for the purpose of statistical analysis (Creswell, 2004). The sample was collected from the population to collect data that could be representative of the whole targeted population. In the positivist paradigm of research, sampling is an important factor for understanding a social phenomenon (Hussey & Hussy, 1997). The research sample is supposedly a fraction of subjects that are drawn from the population of the researcher’s area of interest. Sampling offers detailed information which comprises a small number of units (Sekaran, 2010). The researcher used random sampling from public employees working as medical officers in health organisations in Pakistan for the empirical study. The population for this study was defined as male and female medical officers working in public hospitals in different district headquarters public hospitals. A total of 650 doctors, who were working as general physicians, were identified through two sources: the executive district health officer (EDO) in the respective district and the Ministry of Health.

It was decided to keep the research population sample to 20 districts across the country. There were three reasons behind this decision: time, distance and the poor state of law and order in many parts of the country. The names of the districts and the employees were kept
anonymous due to reasons of confidentiality. Twenty-eight people who had taken part in the pilot study were excluded from the sample. In the first instance the researcher contacted the participants to apprise them of the purpose of the study and give assurances of confidentiality and anonymity. The contacts of the participants were obtained from executive health officers and the Ministry of Health or through the personal efforts of the researcher. After providing confidentiality assurances the researcher handed over the survey questionnaire by personal visits to the respective districts. The postal service was not used to dispatch the survey instrument due to the inefficient and unreliable postal service in Pakistan. The survey instrument handed to the participants included a copy of the questionnaire, and a covering letter stating the purpose of the study duly signed by the research supervisor.

4.9.2 Identified study sample

The sample identified participants who were general physicians working in health organisations in Pakistan. The population was defined as male and female medical officers working in public hospitals between February and August 2010. A total of 650 doctors were identified from all over the country in different regions by establishing contact with executive district health officers (EDOs) and the Ministry of Health in Pakistan.

The survey research method is used in this study to collect data, which is one of the most reliable ways of data collection in the positivist paradigm of research philosophy, due to its easy handling characteristics (Creswell, 2004). This study was cross-sectional and carried out on the sample of public employees working in health organisations with the questionnaire able to cover a large chunk of the sample population.

4.9.3 Procedures for Data Collection

At the start the researcher contacted the randomly selected sample and explained the purpose of the study and pursued them to participate. Once consent had been obtained from the participants and information about confidentiality had been provided, a set of survey instruments was handed over.

The research instrument set included a covering letter signed by the research supervisor, a brief description of the confidentiality clause of Brunel University, and a copy of the research questionnaire. A copy of the questionnaire was handed over during personal visits to the
participants. It was not possible to send the questionnaires by mail and pursue participants to take part in the study. Public hospital doctors have a heavy workload and little time to check their mail often which forced the researcher to travel extensively and pursue the sample population in spite of the fragile law and order in many parts of the country. The researcher allowed participants enough time and freedom of venue to complete the questionnaire and no pressure was been exerted on participants through government sources to fill out the questionnaire. This strategy was adopted to limit subject and error bias, which is concerned with neutral venue, time, and lack of pressure from authorities so participants are able to express what they wish (Robson, 1993).

Over the next 15 days the researcher contacted participants by mobile phone and reminded them to respond. The mobile phone numbers were obtained from participants during the researcher’s first visit to hand over the set of research instruments. Due to the heavy workload and the participants’ other responsibilities, the next three reminders were sent every four weeks. However, after the third reminder, those who did not reply were eliminated from the study.

In this study the researcher applied the probability sampling method of data collection which is more appropriate than the non-probability method. In probability, the method of sampling is one in which every unit has an equal chance of being selected. Random probability sampling is generally ideal and has the added advantage of a more precise estimation (Baker, 2002; Moser et al., 1971). Furthermore, the probability sampling method provides precise information on a cross-section of the whole (Denscombe, 2002).

The researcher has faced a number of difficulties and odd situations due to the country-wide range of the study sample. First and foremost, the concern was law and order in those cities which are under constant threat after war in Afghanistan and Pakistan’s support for the US-led war on terrorism (Janjua, 2009). This situation forced the researcher to carry out regular personal visits to collect the sample for the study. Frequent electricity failures were having a very adverse effect on the respondents’ daily lives and they were not willing to reply, which delayed the responses. The response rate, after hectic efforts and resilience by the researcher, was about 50%. The data collection phase lasted for approximately 22 weeks after the distribution of the survey instrument.
4.10 Data Entry Plan

In this study the data entry strategy/plan was based on the steps of data coding, cleaning and entry to computer files. Coding of data relates to the shift of entries on the survey instrument into numbers and therefore it involves transformation of data information into a computer-readable format (Diamantopoulos & Schlegelmilch, 1997). This helps to create guidelines for data answers and it also makes it easier to record entries on a computer file. In the recording phase data entries are posted to computer files from the questionnaire for the purpose of analysis. Data cleaning involves the double-checking of data entries to make sure that entries have been correctly transferred to a computer file.

4.10.1 Statistical Techniques Applied for Data Analysis

The data analysis of this study runs in three phases. In the first phase, the multi-scale items were refined on the basis of quantitative data collected from different sources. In the second phase, the scales were examined and confirmed using confirmatory factor analysis (CFA) with the help of structural equation modelling (SEM). In the final phase, hypotheses were tested using the partial least square method based on SEM.

A pilot study was carried out first to examine the reliability of the multi-item constructs. Cronbach’s alpha scores were used to establish the reliability of scores in the pilot study (Field, 2006; Tabachnick & Fidell, 2007). The reliability of the main survey was examined and assessed with the help of confirmatory factor analysis and SEM (Hair, 2006 p.776). Indeed, confirmatory analysis examines the validity of constructs by measuring the extent to which a set of measured items actually reflects the construct those items are supposed to measure (Hair, 2006).

The outlier examination, descriptive statistics, dealing with the problem of missing data, linearity tests, normality of data, homoscedasticity, reliability analysis, and exploratory factor analysis were done with the help of SPSS (Statistical package for social sciences) 15.0 version (Hair et al., 2006; Pallant, 2001). The measurement model and path model testing and confirmatory factor analysis were carried out with partial least square (PLS) method is based on structural equation modelling.
PLS’s statistical objective is to show the high $R^2$ scores and significant t-values, thus rejecting the null hypothesis of no effect (Thompson et al., 1995). The PLS technique estimates latent variables as the exact linear combination of the observed measures; it presents the advantage of an exact definition of component scores. This précis in combination with explaining a large proportion of variance in the observed measures is helpful in accurately predicting individuals’ standing on the components (Anderson et al., 1988). The structural equation PLS method is more suited in studies that attempt to measure the predictive modelling. Since this study examined a model which consists of worker characteristics and employee personality aspects in a unique blend and measures its predictive strength to employee job attitude, the use of PLS modelling is more suitable in the analysis and measuring model (Shim et al., 2010).

4.10.2 Assessment of Exploratory Factor Analysis and Reliability Test

Exploratory factor analysis provides the researcher with information about how many factors are needed to best represent the data. Exploratory factor analysis was run to know what the data input can give to the researcher for further analysis (Hair et al., 2006 p.773). It is used at an early stage of the research and gives information about the interdependence (linkage) among a set of variables. Exploratory factor analysis is an extensively used approach in the field of business management and social science studies to measure data and summarise a large set of data for a smaller number of factors that relate for co-variance. In simple terms, exploratory factor analysis summarises the data by making a cluster of variables that are correlated. It provides a tool for consolidating variables and for generating hypotheses about an underlying process (Tabachnick et al., 2007; Pallant, 2001). According to Field (2006), the existence of a group of massive correlation coefficients between pairs of variables suggests that those variables could be measuring aspects of the same underlying dimensions. These underlying dimensions are known as factors (latent variables). By reducing the set of data from the huge group of connected variables into a small set of factors, factor analysis achieves parsimony and explains the maximum amount of common variance in a correlation matrix applying the smallest possible number of explanatory concepts (Field, 2006 p.620).

This study extracted factors with the use of exploratory factor analysis SPSS version 15.0 for Windows. Exploratory factor analysis has many methods for data extraction and rotation; among these, the principal component extract method is the most common and widely used.
method; it was used by the researcher to extract a minimum set of variables which explained the maximum variance in the data (Tabachnick & Fidell, 2007). Adequacy of extraction and factors were measured with the help of common method of eigenvalues. Eigenvalues cut of value of one or more were kept as the threshold for this study to measure the adequacy component of factors. The variance for any given variable has to be computed before heading to extract factors as a very important precondition. In order to measure the variance, communality can be calculated from factor loading. Communality is the proportion of common variance present in a variable. A variable that has no specific variance would have communality of one; a variable that shares none of its variance with any other variable would have a communality score of zero (Field, 2006 p.630). In this study the researcher has taken up the variables with a value above 0.5 as the threshold (Hair et al., 2007).

The study attempted to obtain the best possible pattern of factors and, in order to extract the best interpretation, the varimax rotation method was applied. The varimax rotation method has a very significant role in increasing the understanding and scientific usefulness of a solution. According to Tabachnick et al., (2007) varimax is the variance maximising procedure, the purpose of which is to maximise the variance of factor loadings by making high loadings higher and low ones lower for each factor. This study followed the varimax rotation method which is a popular and highly acclaimed orthogonal factor method that focuses on simplifying the columns in a factor matrix. Generally the varimax method is considered to be superior to other orthogonal factor rotation methods in achieving a simplified factor structure (Hair et al., 2006).

4.10.3 Evaluation of Confirmatory Factor Analysis

Confirmatory factor analysis is a much more sophisticated technique applied in the advanced phase of the research process to test a theory on its latent processes. This analysis is often carried out through structural equation modelling (Tabachnick & Fidel, 2006). Confirmatory factor analysis is employed to confirm the already established hypotheses and the relationship between a set of measurement items and their respective factors. In confirmatory analysis a researcher uses measurement theory to specify a priori the number of factors as well as which variable loads on those factors. This analysis is applied to ascertain that pre-applied linkages on the basis of theory really exist in the data (Hair et al., 2006). In order to test and develop a theory the construct validity is one of the important preconditions. Construct
validity is woven into the theoretical fabric of the social sciences, and is central to the measurement of abstract theoretical concepts. In the field of social sciences construct reliability is concerned with the extent to which a particular measure relates to other measures consistent with the theoretically derived hypothesis concerning the concepts (constructs) which are being measured (Carmine & Zeller, 1979). Hence, on the basis of this principle, confirmatory factor analysis was applied as a stringent measurement of construct validity to ensure that the theoretical connotation of the construct is empirically captured in a real sense by its indicators (Bagozzi et al., 1991). The confirmatory factor model is a very strong method to deal with construct validity, formulate very limited assumptions and provide additional diagnostic information about reliability. The confirmatory factor analysis approach provides advantages such as 1) measures of overall degree of fit are provided in any specific application 2) useful information is supplied as to if and how well convergent validity and discriminant validity are achieved 3) makes available the explicit results for separating variance into trait, method, and error components (Bagozzi et al., 1991: Bagozzi et al., 1982; Steenkamp et al., 1991). This exercise is used to generally examine the uni-dimensionality of scale which is important to calculate the coefficient alpha (indicator of reliability) and calculation of composite scores (Clark et al., 1995; Cortina, 1993).

4.11 Scale Validity

Scale development signifies the extent to which an operational measure accurately reproduces the concept being investigated or the limit to which the latent construct is the underlying cause of item co-variation (Devllis, 1992). Four types of validity criterion set for this study and the detail of those are as follows:

1. Face validity

   According to Collis & Hussey, (2009) face validity is one of the common means to check validity. Face validity simply ensures that tests or measures used by researcher do actually measure what they are supposed to measure.
2. Content validity
Content validity refers to the adequacy with which a measure has sampled from the intended universe of domain of content (Pallant, 2007). In other words, it is the extent to which a specific set of items reflect a content domain.

3. Criterion validity
Criterion validity is the relationship between scale scores and some predetermined measure standards (Devellis, 1991), or “the extent to which a specific set of items replicates to a content domain.” Criterion validity is often referred to as predictive validity.

4. Construct validity
This is the technique by which the researcher may assess if the measure really is measuring the theoretical concept that it is supposed to measure. With hypothetical constructs, the researcher must be able to exhibit that research findings can be measured and explained by the construct (Collis & Hussey, 2009).

4.11.1 Structural Equation Modelling and Model Assessment

The main analysis of quantitative data in this research study was done by applying structural equation modelling (SEM) technique. SEM is a combination of statistical techniques that allow a set of relationships between one or more independent variables, either discreet or continuous, and one or more dependent variables to be measured.

SEM is also referred to as casual modelling, path analysis or confirmatory analysis (Tabachnick et al., 2007). According to Hair et al. (2006), SEM provides the most appropriate and efficient estimation technique for a series of separate multiple regression equations estimated at the same time. It consists of two basic components 1) the structural model, and 2) the measurement model.

The structural model denotes the path model that connects independent to dependent variables. In such a formation, theory, prior experience or other guidelines enable the researcher to identify which independent variables predict the dependent variable (e.g., job satisfaction); whereas the measurement model of SEM assists the researcher in the application of several indicators (variables) for a single dependent variable.
The SEM characteristics of simultaneous analysis make it distinct from most first generation statistical tools such as correlation, regression, and factor analysis, which have limited power to analyse only one layer relationships of independent variables and dependent variables at a time (Chin, 1998). SEM performs a dual action in assessing not only the causation among the dependent and independent constructs but also assesses the loadings of measurement on their designated constructs and consequently factor analysis and hypotheses are examined in the same phase (Hair et al., 2006; Tabachnick, 2007). The joint analysis of the measurement and structural model facilitate measurement error of the observed variables to be analysed as a vital part of the model, as well as factor analysis to be combined in one operation with hypothesis testing. This ultimately results in a more rigorous and robust analysis of the proposed model and better methodological assessment (Bollen, 1989; Gefen et al., 2000).

SEM tools are extensively applied in the field of behavioural science research for the assessment of the casual modelling of complex, multivariate, data sets in which the researcher put up compound measures of proposed constructs (Hair, 2006). The application of SEM in the field of business management studies has substantially increased due to the availability of several software packages that perform SEM (Chin, 1998).

### 4.11.2 Rationale for Adopting SEM

SEM technique is adopted as the major analysis technique for the model testing in this study. This provides a proper and well-organised inference for the series of separate multiple regression equations. Application of this technique builds up two components such as measurement model and structural model which aspire to confirm the reliability of the theoretical model and estimated model (Tabachnick & Fidell, 2007; Hair, 2006). SEM is suitable in studies that attempt to understand the predictive modelling and mathematical modelling of complex processes to serve both theory and practice (Gefen et al., 2000). SEM has the capability to integrate latent variables into the analysis and since this study is looking at employee job attitude such as job satisfaction, it is expected that variables of the study are likely to be unobserved concepts that can only be approximated by measured variables (Tabachnick & Fidel, 2000). SEM utilises confirmatory modelling that will serve the objectives of this study to confirm the hypothesized relationship between model variables (Tabachnick & Fidel, 2006). In this study smart partial least square method (SMPLS)
software is used as the structural equation modelling tool. The objective of this tool is to demonstrate a high $R^2$ score and significant t-value thus invalidating the no effect of null hypothesis (Thompson et al., 1995). SMPLS executes an iterative set of factor analysis coupled with path analysis until the difference in the average $R^2$ of the constructs becomes insignificant. At the structural level SMPLS estimates path coefficient and correlations among the latent variables along with the individual $R^2$ and AVE (average variance extracted) of every latent constructs (Thompson et al, 1995). After the measurement and path model have been estimated in this approach, SMPLS applies bootstrap application to approximate the significance t-value of the paths (Chin, 1998).

In SMPLS a good model fit is established with the help of significant path coefficient and acceptably high $R^2$ score and internal consistency (construct reliability) being over 0.70 for each construct (Keil et al., 2000; Chin, 1998; Thompson et al., 1995). Confirmatory analysis in SMPLS was carried out with the assessment of verifying construct convergent and discriminant validity, checking that the AVE of every construct is larger than its correlation with the other constructs, and that each item has higher loading on its assigned construct than on other constructs (Gefen et al., 2000).

Chapter 6 of this thesis elaborates in depth the results of both the structural and measurement models of this study. Chapter 6 also examines how the outcome from this analysis provided results that examine and measure the research model in conditions of accepting or rejecting the hypotheses.

In this study the researcher adopted a two step strategy which involves the structural and measurement model specification. This approach consists of a two phase strategy in which the first phase examines the structural model and was preceded by the approximation of the measurement model (Anderson et al., 1988). In the first stage the researcher also established valid constructs that were set in the advanced theory testing to prove causal relationships between them. In the next phase, SEM substantiates the pre-established link between the endogenous and exogenous variables and is running a simulation-based multiple regression analysis (Hair et al., 2006).
4.11.3 SEM to examine hypotheses

In this study hypotheses were tested by applying the technique of SEM. The application of SEM to measure the predictive strength of a variable is one of the most effective and robust means in the field of employee psychology, human resources management and social sciences.

This is a widely applicable and appropriate approach for evaluating the relationship between a dependent and independent variables owing to its well built underlying statistical theory (Edwards, 1984; Levine, 1977). Following the assumptions of SEM, the research hypotheses were tested with the help of standardised estimate and t-value. Data analysis was carried with the help of PLS software to examine the model for the hypotheses (Chin, 1998, Keil, 2000; Anderson, 1988)

As per the specification of Hair, et al. (2006) and Tabachnick (2007) the following statistical assumptions were examined and analysed:

-Descriptive statistics including examination of the outliers was carried out to provide an overview of the cumulative data to be used in the data analysis. The identification of potential outliers is important in order to understand the magnitude of distortion that may affect regression coefficient and the description of relationship in a sample (Hair et al., 2006). Outlier detection assessment was done with SPSS 15.0 for Windows (chapter 6).

-Multi-collinearity is the extent to which a variable can be explained by other variables in the analysis. As the multi-collinearity increases, it complicates the interpretation of the data under evaluation. In the presence of multi-collinearity among variables it becomes difficult to establish the effect of a single variable due to the variables’ interrelationships (Hair et al., 2006). The occurrence of multi-collinearity takes place when the variables under study have a strong correlation between two or more predictors in the regression model (Hair et al., 1992). In order to examine the multi-collinearity effect this study has adopted a rather more sophisticated and robust approach than simply analysing the Pearson’s correlation. Generally those variables which show a strong correlation (i.e., .90) indicate a multi-collinearity problem (Pallant, 2005). In order to address the assumptions of multi-collinearity, the researcher employed SPSS 15.0 for Windows to evaluate the condition index and variance inflation factor (VIF) of the model with recommended threshold values (Hair et al., 2006).
Normality assessment of the data was examined by applying Kolmogorov and Shapiro test methods (Pallant, 2007), in addition to the normal Q-Q plot; these were examined to check the normality of residuals (see chapter 6).

In order to understand the dependence of the relationship between variables the next important factor to be taken into consideration is the homoscedasticity. Homoscedasticity refers to the assumption that dependent variables demonstrate equal levels of variance across the range of predictor variables. Homoscedasticity is desirable because the variance of dependent variable being explained in the dependence relationship should not be concentrated in only a limited range of the independent values (Hair et al., 2006). In other words, it can be assumed that homoscedasticity estimates the variance of the dependent variable across the various independent variables of study (Field, 2006). The phenomenon of homoscedasticity occurs when the residuals in regression specification have equal (Homo) spread (scedasticity); any increase or decrease of variance is called heteroscedasticity (Gujarati, 1992; Hair et al., 2006). The homoscedasticity of any data in social sciences and business management is measured by graphical and statistical methods (Hair, 2006; Field, 2006).

Following the evaluation of important assumptions, the researcher tested the significance of the parameters estimated and described the findings accordingly.

4.12 Ethical considerations

Ethical issues have a very important role in a study when it involves human subjects. According to Cavan (1977 p.810), ethics has been characterised as ‘a matter of principled sensitivity to the rights of others’ and that ‘while truth is good, respect for human dignity is better.’

Ethical considerations reaches through the entire process of research as a whole, no more so than at the stage of access and acceptance where appropriateness of topic, designs, and methods, guarantees of confidentiality, analysis and dissemination of findings must be negotiated with relative openness, sensitivity, honesty, accuracy, and scientific impartiality. Many factors may need to be taken into account and these may differ, such as: the age of those being researched; whether the subject matter is sensitive; and, whether the aims of the research are in any way subversive (Cohen et al., 2007). In this study, the researcher
followed all ethical requirements throughout the different stages of the study. At the beginning of the data collection process, permission was obtained from the relevant quarters of the Ministry of Health to conduct the survey. The contact addresses of medical practitioners were obtained from district health executive officers. The survey instrument pack given to sample population through personal visit contained the survey questionnaire along with a letter from research supervisor. The participants were requested to take part voluntarily according to their own free will and were informed that they had the freedom to withdraw from the study if they so desired. All respondents were given assurances that the secrecy and confidentiality of responses would be guaranteed. All participants of the study were requested not to state their name on the survey and the data was also coded in a way to ensure the confidentiality and anonymity of the research process in this study.

Brunel Business School ethics committee guidelines were followed and an ethics form for the research was signed by the researcher and the research supervisor. The ethics form was submitted to the academic programme office stating the adherence to research ethical considerations. In addition, a consent form was attached with the survey instrument which explained the title of the research, study, the researcher and school name, purpose of the study and what was involved by participating which could be clearly understood by the respondents prior to filling in the survey instrument (Appendix E).

**Conclusion**

In this chapter the researcher provides the rationale behind the two research paradigms that is, positivist and interpretivist; the philosophical stance for both paradigms was developed. It is concluded that employee job attitude and behaviour can be measured with the help of a positivist philosophical stance. On that account many researchers in the domain of human resources management and organisational behaviour have followed a positivist paradigm. Consequently the positivist approach of the research philosophy was deemed to be an appropriate approach for this research. In this study the researcher collected data from the employees of health organisations in Pakistan through the survey questionnaire instrument. The survey instrument is framed in four sections, that is, ‘employee views regarding employee job satisfaction and pleasure which employees derive from a job’, ‘employee perception regarding different work characteristics’, ‘employee personality aspects’ and ‘employee demography’. 
The employee demography profile includes information such as gender, age, marital status, length of service, and academic qualifications. A pilot study was conducted in the first phase to measure the reliability and validity of the survey instrument and to assess and fulfil the requirement of validity and reliability. In the next phase a full-scale survey from the proposed sample was conducted.

All aspects of practical considerations, such as sampling, participation, measurement scales and data analysis procedures were also examined in this chapter. After completing the data collection phase, the data was cleaned, coded and entered on the computer file software of statistics for social sciences (SPSS) version 15.0 for Windows. Analytical techniques such as descriptive statistics and exploratory factor analysis were also examined in a concise manner. Exploratory factor analysis anticipated to confirmatory factor analysis, which involves confirming the factors with the support of structural equation modelling (SEM). SEM is applied as a strict examination of construct validity to authenticate that the theoretical meaning of construct was empirically obtained by its indicators. Particular importance is given to SEM data analysis technique that is applied in this study by the researcher. This chapter rationalises the use of the SEM two-step approach as the key quantitative application. This approach is adopted to predict a causal analysis of employee job attitude measured with the help of a complex model based on organisation work characteristics, employee personality aspects, and demography profile.
Chapter Five: Pilot study

Pilot study is carried on in any research project to assess the usefulness and validity of instrument. In real sense Pilot study is a process through which researcher checks the usefulness of freshly prepared Questionnaire instrument. This exercise helps to correct the weaknesses/flaws of instrument before circulating it to proposed sample population for full scale research study. In present study to assess the employee job satisfaction in public organisations work setting researcher has used questionnaire survey method to measure employee job satisfaction and its determinants. The conceptual frame work of this study of employee job satisfaction is based on organisational factors, and employee personality factors.

The Questionnaire instrument used in this study took approximately six months to get its final shape and finally in six months time reached to the stage to be distributed for piloting among the sample of General Physicians working in Government run Hospitals in Pakistan. The Researcher contacted the proposed sample through various means. Some of the Doctors were contacted via telephone, email, and others through personal contacts.

After getting consent from them to participate in pilot study, Copy of Questionnaire handed over to them through personal visit to their respective offices in Government run hospitals at different locations. The purpose of study, confidentiality protocol as well as data protection assurance given to all participants at the time of distribution of questionnaire. This pilot study measured the reliability of survey instrument and checked the usefulness of it before using it in main study for data collection purpose. In Total 40 Questionnaires were distributed among doctors for this pilot study and 28 were returned that amounts 70% response rate. The researcher has greatly benefited from pilot study by checking the validity of the questionnaire and measuring the reliability. Pilot study also helped to modify and make instrument adaptable as if required according to the need of sample. Reliability of this survey instrument was measured with the help of computing Cronbach’s coefficient alpha and inter-correlation of scales was measured by using Pearson’s correlations.
5.0 Research Protocol Approach

In Business research set of rules analysis data collection method adopted to classify the mental processes in problem solving. The purpose of the method is to uncover how people act and reflect their feelings in specific situation, mainly in explaining and sort out a complex problem (Collis & Hussey, 2009). Research protocol is definite set of rules arranged for specific study. In research of business management research protocol acts as important instrument that can be applied to discover the stepwise review of literature and new piece of research. Research protocol may make it possible to have smooth flow of study. In any research study research protocol is one of the difficult steps and needs several steps to follow like introduction of study, aim and objective of study, hypothesis, setting and then collection of sample, setting research methodology, statistical methods for data analysis, and scheduling of study (Holloway & Mooney, 2004).

5.1 Direction and Purpose of the Study

The fundamental purpose of this thesis is to assess the employee job satisfaction predictors that may contribute to develop employee job attitude and behaviour for employee satisfaction in work setting. It is examined that employee can build up positive job attitude and motivation on the basis organisational work attributes and employee personality disposition. Hence this study focused on the organisational work attributes and employee personality disposition to assess the magnitude of these factors to employee job attitude for employee job satisfaction.

5.1.1 Validity

Researchers in social science endeavour to measure elusive constructs, such as people’s behaviour. The predicament is that one cannot recognize with confidence whether what is being measured communicates accurately to what one desires to determine. Therefore, social scientists have developed process of validly measuring such concepts. The validity of a scale denotes to the level to which a scale calculates what it professes to measure (Bryman and Bell, 2003). An examination of validity should be capable of substantiating what is already known (Creswell, 2007). In spite of this, no single, clear-cut test of a scale’s validity seems to
be existent. Consequently, the validation of a scale needs the collection of empirical data concerning its application (Pallant, 2007).

Validity is the level to which the findings of research genuinely reflect the phenomena under the study. Validity assists to know that research findings accurately represent what is happening in situation; in other words, whether the data collected represent a true picture of what is being studied (collis &Hussey, 2009). In this work researcher has used four general outlines of validity to check the validity of instrument

5.1.2 Face validity

According to (collis &Hussey, 2009) face validity is one of the common means to check validity. Face validity simply ensures that tests or measures used by researcher do actually measure what they are supposed to measure.

5.1.3 Content Validity

Content validity refers to the adequacy with which a measure has sampled from the intended universe of domain of content (Pallant, 2007). In other words it is the extent to which a specific set of items reflect a content domain.

5.1.4 Criterion Validity

Criterion validity is the relationship between scale scores and some predetermined measure standards (Devellis, R.F., 1991) simply this denotes to “the extent to which a specific set of items replicates to a content domain. Criterion validity is often referred to as predictive validity.

5.1.5 Construct Validity

This is the technique through which researcher may assess if measure really is measuring the theoretical concept that it is supposed to measure.

(Collis &Hussey, 2009) With hypothetical constructs, researcher must be able to exhibit that research findings can be measured and explained by construct
5.2 Hypotheses Development

In organisations employee job satisfaction can be developed on the basis organisational work attributes and employee disposition. The literature suggests that organisational work attributes and employee personality disposition influence employee job attitude and motivation for job satisfaction. On the basis of the various factors such that procedural justice, Job training, Esprit de corps (team work), Working conditions, Job clarity, employee self esteem, self efficacy belief, and Neuroticism an integrated framework has been developed to examine the impact of predictors to job satisfaction. Following the conceptual framework following hypotheses have been developed.

5.2.1 Hypotheses

1- Employee perception of procedural Justice has positive impact on employee Job satisfaction

2- Job Training provided to employee on job is positively correlated to employee Job satisfaction

3- Esprit de Corps (team spirit) in organisation has positive influence on employee job satisfaction

4- Working conditions have positive influence on employee job satisfaction level

5- Job clarity is positively correlated to employee job satisfaction level

6- Task significance (worth of job) has positive influence on the rating of employee job satisfaction

7- Generalised self efficacy trait of individual has positive impact on his job satisfaction level
8- Self esteem has positive correlation to employee job satisfaction level in public organisations

9 - Employee locus of control orientation is significantly correlated with employee job satisfaction

10- Employee neurotic personality trait (lower emotional stability) has negative correlation with job satisfaction
5.3 Aims and Objectives

In this study researcher attempts to understand and examine the predictors of employee job satisfaction in public organisations in developing country work settings. Literature suggests that employee job satisfaction in public organisations merely does not rely on altruism feeling. There are some other factors such as organisational factors, demography, and employee psychology. Following this researcher focuses on organisational factors and employee personality trait which influences employee job attitude such as job satisfaction in public organisations.

The major purposes of this pre-test (Pilot) study are

- To check the reliability of various scales incorporated in this survey questionnaire
- Assess the organisational work attribute and personality aspects correlation to employee job satisfaction.
- Test out the total time spent in completing the questionnaire, the degree of difficulty and propositions for further improvements.

5.3.1 Study Setting

This research study was carried in public sector health care organisations based in Pakistan. Health sector is one of the very neglected along with education sectors in Pakistan. A survey questionnaire technique was applied in this study by researcher to study employee behaviour and job attitude for employee job satisfaction.
5.4 Method and Design Applied

This study followed the cross sectional one-shot experimental design approach to assess the impact and predictive relationship of independent variables to exogenous variable of the study. It is realised that the association between variables can be examined with the support of positivist approach and on the numerical basis to understand the human behaviour such as Job satisfaction. In this regard a step wise research strategy was followed to examine this study propositions. Step wise strategy guided to answer the research questions and provide substantive evidence for the study propositions. This step wise strategy began with substantial and careful literature review to identify the void in the research and understanding of job satisfaction theories. This led researcher to develop a theoretical frame work as base for empirical study. To assess and examine the proposed theoretical model, data is prerequisite to authenticate the research propositions. The proposed data type of this was identified as quantitative, the researcher established the epistemological stance for study, and research strategy identified. Survey questionnaire is a tool to gather quantitative data related to the predictors amalgamated in the study theoretical framework.

A pilot-test study was conducted by researcher before the full scale study to examine the independent variables relationship to dependent variable. A pilot study was done with the purpose to measure the reliability and face validity of research survey instrument. Ethical issues were also taken into account during the data gathering and all participants were provided complete freedom to withdraw from study at any stage and participation was voluntary. Participants involved in this research had choice to withdraw from study at any time and were requested not mention their name on survey to accomplish the confidentiality and anonymity throughout the entire research process. In this study empirical data was gathered from the employees of Public health care organisations of Pakistan. Researcher used widely applied tool of Statistical package for social sciences (SPSS) to surmise the outcome generated from the data. Numerous studies applied this approach and examine the relationship of determining variables (Markovits et al, 2007; Gardulf et al, 2008; Brunetto et al, 2005). Different statistical tests such as descriptive statistics, correlation, and Alpha (α) were generated from the data with the help of applying SPSS. Descriptive statistics include frequencies, means, and standard deviations to provide information about the sample demographics and results. At the same time for Alpha reliability scores, and Pearson’s
correlation were also applied by the researcher to generate the results (Hair, et al., 2006; Tabachnick, 2002.). The pilot study ends with considerable discussion, findings and observations for upcoming research.

5.4.1 Method followed in Pilot study

The Pilot study for this empirical analysis was taken up in the mid September 2009 and October, 2009. The survey instrument was given to randomly selected participants with piloting purpose to check the deficiencies of survey instruments. The participants were medical doctors working as general practitioners in public health care organisations in Pakistan. In first step researcher contacted the concerned doctors through electronic mail and telephone calls and apprised them about the aim and objectives of study and confidentiality provisions. Afterwards a questionnaire survey was handed over to them through different channels. Address and contact number were obtained through executive District health offices and Directorate of health services in Pakistan. A survey instrument packet included a copy of survey questionnaire, and covering letter from supervisor explaining the purpose of the study and information about the researcher.

Data analysis for the data generated from the pilot study was done with using SPSS (Version 15.0 for windows). Ahead of data analysis process, the questionnaire items were assigned code in the SPSS programme for the convenience of the researcher. Descriptive statics including mean, standard deviation, and frequencies were generated for all the study variables. The pilot study aimed to assess the key requirements throughout instrument purification e.g. checking questions wording, arrangement, layout, understanding with respondents, response rate, questionnaire end time and analysis procedure (Sekaran, 2010) Moreover, it targeted to appraise the degree of content validity and reliability to confirm that the directions, questions and scale of questions were flawless to comprehend (Sekaran, 2010; Pallant, 2006). Before, dissemination of the instrument, questions wording ‘face validity’ standard were examined by sending handful of survey questionnaires (via electronic mail) to the General physicians working in leading healthcare institutions in public sector of the Pakistan. As the questions within instrument were commonly used in in the domain of human resources literature with simplified language, therefore very little alterations were suggested
by respondents, and confirmed the truthfulness of face validity. In refinement activity of the instrument, following stage afterward content validity is reliability (i.e. Cronbach’s $\alpha$) of the instrument that confirms that ‘measures are free from the error and thus generates reliable outcomes (Pallant, 2006). In addition, inter-item correlation test was run to check that scale selected for this study are in harmony with the data (Creswell, 2003).

5.4.2 Outcome of Pilot Study

The pilot study took approximately 8 weeks time to get accomplished. In total 75 questionnaire were disseminated among public health care practitioners in 5 district hospitals. Out of those 40 questionnaires were returned after couple of polite reminders to participants and that stood approximately 55% response rate. Out of those 28 fully completed questionnaires were used for data analysis in final phase. Minimum and maximum time reported by respondents to complete the survey instrument was between 12 minutes to 40 minutes as maximum. On average participants has taken about 15 minutes to complete the survey instrument.

5.4.3 Details of Pilot Study Sample

The demographic information of those who took part in pilot study (table 10.) reveals that 58 % (16) were males and 42 % (12) were females and were between the age of 25 to 50 years. Most of them 85 % (n=24) were married and remaining reported their marital status as single. Twenty five participants reported their academic qualification as bachelor in medicine and surgery (MBBS) where remaining were having postgraduate qualification. Majority of respondents (71%, N=21) had length of service as Public health care general medical practitioner about 6 to 10 years.
Demographic Category | Frequency
---|---
Gender | 
Female | 12
Male | 16
Marital Status | 
Married | 24
Single | 04
Divorced/Others | 00
Length of Service | 
<1 year | 01
1-5 years | 03
6-10 years | 21
11-20 years | 02
>20 years | 01
Academic Qualification | 
Bachelor/MBBS* | 25
Masters | 03
Other | 00
Age (Distribution) | 
18-25 years | 03
26-40 years | 14
40-50 years | 09
50+ years | 02

*MBBS= Bachelor in Medicine and Surgery

Table 10 Demographic attributes of sample

5.5 Descriptive Statistics

The response collected in pilot study indicated that overall, the participants reported them as less dissatisfied with their job with mean score of (M=3.25±0.86) on seven point likert scale of strongly dissatisfied (1) to strongly satisfied (7). In organisational work attribute scale the procedural justice factor reported to have positive impact on employee job satisfaction. On other hand in employee personality disposition scale the variable employee self efficacy belief reported to be considerable impact on employee job satisfaction.
5.5.1 Reliability Test

In any research study which involves the multi-items scales, it is very important to assess those multi-items scales. The examination of multi-items scale provides information about reliability and internal consistency of the scale which is the foremost step for factor analysis (Churchill, 1979). Cronbach’s alpha test is the widely applied method to determine the reliability of scale. Cronbach’s alpha assessment determines whether all items are measuring the same construct (De Vellis, 1991). Over all scales applied in this study by researcher has reliability score of 0.906 that signify the higher internal consistency among the scales which are used by researcher to measure employee job satisfaction and its determinants (Pallant, 2007). According to Nunnally (1978) value of alpha (α) equivalent to 0.70 and above shows that items are reliable, however in early stage of research of alpha score of 0.50 to 0.60 are also considered as satisfactory. In this study the reliability score of individual scales however, vary from scale to scale ranging from 0.703 to 0.907(Table 7.) and identify that each scale keeps it own internal consistency. Findings can be said to be reliable if researcher replicate the earlier research outcomes and find the identical results. (Collis &Hussey, 2009). The reliability scores generated for this study support that this survey instrument can be reliably applied to determine employee job attitude and motivation for employee job satisfaction.
5.5.1 Coefficient Alpha for Pilot Study

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<thead>
<tr>
<th>Scale</th>
<th>Alpha score</th>
<th>Source</th>
</tr>
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<td>.830</td>
<td>Warr et al 1979</td>
</tr>
<tr>
<td>Procedural Justice</td>
<td>.907</td>
<td>Niehoff et al 1993</td>
</tr>
<tr>
<td>Working conditions</td>
<td>.703</td>
<td>Quinn et al 1974</td>
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<td>.770</td>
<td>Campion et al 1993</td>
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<td>.850</td>
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<td>Over all total Questionnaire</td>
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Table 11 Reliability Score
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<th>Construct</th>
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<th>Cronbach’s Alpha if item deleted</th>
<th>α(score)</th>
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<td>JS2</td>
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<td>JS4</td>
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<td>.829</td>
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<td>.701</td>
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Table 12 Construct Item Correlation

Sample size larger than 30 and less than 500 are appropriate for most research and in studies Where sample to be broken into sub samples:(male/female), a minimum sample size of 30 for each category is necessary for data analysis and generalisation of findings. In multivariate research (including multiple regression analysis), the sample size should be several times (preferably ten times or more) as large as the numbers of variable in the study. For simple experimental research with tight experimental controls (matched pairs, etc) successful research is possible even with sample as small as 10 to 20 in denomination (Sekaran, 2010).
### 5.6 Pearson’s Correlations Breakdown

In this pre-test substantial correlations between the scales were established at two levels such that \( p=0.05 \) and \( p=0.01 \)(table 13). In this pre-test pilot, the procedural justice factor from organisational attributes scale and self efficacy belief from personality aspects are found to be extensively and positively correlated (\( P<.01 \)) with employee job satisfaction determination (table 13). Whereas the other factors of organisational work attributes scale and personality aspects scale are varying correlation to employee job satisfaction. However, task significance and locus of control factor found to be no or trivial correlation to employee job satisfaction. Following (table 13) illustrates descriptive statics, and Pearson’s correlations for all variables.

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<th>Justice</th>
<th>Training</th>
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</table>

**Notes:** Total \( N = 28 \); \* \( p < .05 \); \** \( p < .01 \) (two-tailed);

**Table 13 Pearson Correlation Table**
5.7 Ethical consideration

In this study researcher adhered to the Brunel business school ethics code. A number of parameters have been followed before the data gathering process. The research instrument pack handed to participants included the consent form that clearly stated that participation is voluntary and they can withdraw from the study at any time if they feel it is necessary. In addition they have been informed that they have freedom to turn down any question. It has also been assured to them that the information provided by them will be kept confidential and anonymity will be maintained by researcher (Appendix E). On the fulfilment of these conditions Brunel Business School approved permission to conduct research for this thesis.

5.8 Discussion

The rationale of this pilot study was to know the reliability of various scales incorporated in this survey questionnaire, which were to be employed in the full scale field study to explore employee job attitudes, beliefs, and employee personality disposition for job satisfaction. The survey questionnaire for this study was set up with four major scales such that study participants’ demographic variable, Organisational work attributes, employee personality aspects, and employee motivation for job satisfaction. Before, starting main full scale study this pilot test was conducted with the purpose to gather data for organisational work attributes, employee personality aspects, and job satisfaction. This exercise assisted to evaluate correlations and measure up to organisational attributes factors and personality aspects data from different perspectives. Since the sample size for pilot study was small (N=28) some of the variables were not significantly correlated with dependent variable of job satisfaction. However, considerable number of variables is significant and provides interesting and valuable support for extended research. In this pilot study, by and large outcome of the scales was discovered substantially reliable, as revealed by Cronbach’s α (.906), which demonstrates high internal consistency among the range of scales integrated in this questionnaire instrument. However, reliability of all eleven scales varies from each other. In respect of relationship between organisational work attributes and job satisfaction, the pilot study found significant correlation for procedural justice, job training, esprit de corps, working conditions, and job clarity to job satisfaction. The significant correlation of these variables to employee job satisfaction is in accordance with prior studies (McAuliffe et al.,
Interestingly some organisational attributes variables were found more significantly correlated with job satisfaction than others. These results indicate the relationship of various organisational attributes and employee job satisfaction. Hence, organisational work attribute scale variables can be employed to discover employee job attitude and motivation regarding employee job satisfaction.

The results related to the relationships between personality aspects and job satisfaction exhibited that out of the four personality aspects, self esteem, self efficacy belief and neuroticism demonstrated moderately close links to job satisfaction although locus of control aspect found not statistically significant. If the sample size were big enough, the correlation probably was statistically significant for the variables which were not found significantly correlated with each other in this pilot study.

Interestingly the three variables from the personality aspects that is self esteem, self efficacy belief, and neuroticism discovered significant relationship with job satisfaction in pilot study. Several studies examined the impact of these variables to predict employee job attitude (Judge and Bono, 2001; Judge et al, 2001; Faragher etal, 2005; Johnson et al, 2008).) However, in the context of developing economies work context no known studies are available in the domain employee job satisfaction. Therefore, it might be suitable to further examine the link between employee self esteem, self efficacy belief, neuroticism, and job satisfaction. Employee personality scale discovered three out its four constructs significantly correlated with employee job satisfaction. Employee personality aspects related three constructs that is to say employee self esteem, employee self efficacy belief, and neuroticism were found reliable which bring to light the fact that all three personality constructs.

Blackburn & Robinson (2008), Judge etal, (2002), and Anna (2010) described that employee job attitude to determine job satisfaction can be assessed by his her personality disposition. The outcome generated from this pilot study also discloses that employee personality scale constructs are significantly correlated with employee job satisfaction scale. In addition this result verify the fact that employee can develop job attitude to predict job satisfaction not only on the basis of organisational attributes but also with personality disposition factors.
5.9 Conclusion

The purpose of this pre-test pilot study earlier the main study was to acquire Organisational attributes, job satisfaction and personality aspects data, to analyze correlations, determine the reliability of all constructs employed in this study and to compare job satisfaction predictors’ data from different sources. In spite of limited number of sample most of the constructs found significantly correlated with each other. However, some constructs were not significantly determined which might be due to small sample size. By and large pilot study findings disclosed less job satisfaction among the public health care professionals. In addition researcher was interested in exploring the relationship of organisational work attributes, personality aspects to employee job satisfaction. Interestingly pilot study managed to emerge the considerable correlation between proposed predictive constructs and employee job satisfaction. Hence, it necessitates the need for further exploration and questionnaire survey full scale study with big sample size to examine the precise impact of organisational and personality factors relationship to job satisfaction. This Pilot study assisted researcher to attain the basic purpose of exploring the relationship of organisational work attributes, personality aspects, and job satisfaction. Prior literature also suggested the significant impact of organisational work attributes, and personality aspects to job satisfaction. Researcher conducted this pre-test pilot study to make certain that questions really measure what they are supposed to measure and that the questions are recognized by all respondents in a similar way. Piloting also helped to find out that the questionnaire creates a good impression, that questions are answered correctly and respondents report any bias (Dillman, 1978).

This pilot study disclosed higher internal consistency of all employed scales and recognised encouragingly significant correlations between different scales integrated in the developed and then piloted survey instrument, which as a result can be applied to study employee job attitudes and behaviours to motivation for job satisfaction. Interestingly the task significant and locus of control variables influence at work place, despite satisfactory coefficient alpha reliability, may not be significantly correlated with employee job satisfaction as determined in this pilot study. However, this pilot study anticipated the need to confirm these findings applying this survey instrument in a full scale study with considerably sizeable sample size in the field. As a finding, it might be construed that further exploration and research need to concentrate on following concerns:
Organisational work attributes, personality aspects, and job satisfaction data to be accumulated from considerably sizeable sample by means of survey questionnaire instrument. Next a comprehensive data analysis should be done to observe the relationship between organisational work-related attributes, employee personality disposition aspects and job satisfaction. The pilot study has been valuable to acquire useful information about employee job attitude, motivation, contentment and further refining the research idea.
Chapter six: Main study Findings and Analysis

Introduction

In order to achieve the objectives and understand the relationship between proposed independent variables (IV) and dependent variable (DV) which is employee job satisfaction a number of statistical approaches are used in this study. In this chapter researcher identifies and discloses the relationship between independent variables and dependent variable. In order to achieve this purpose researcher has followed the quantitative approach which involves the application of questionnaire instrument. Following this approach researcher used questionnaire to get data from targeted sample. Targeted sample of this study were general physicians working in public hospitals.

In brief this chapter covers the data analysis procedures applied to extract results. Researcher used Statistical package for social science (SPSS) version 16.0 which is called SPSS in general terms. Along with SPSS advanced data analysis technique of Structural equation modelling based on Partial Least Square Method (PLS smart) is used to carry confirmatory analysis. The chapter follows the steps of research plan, nature of data analysis, data screening, missing data evaluation, outlier detection, normality, linearity, homoscedasticity test, exploratory factor analysis, and confirmatory factor analysis using structural equation modelling method.

6.0 Research Engagement Plan

The data collection process for this study was carried during October 2009 to Mid February 2010. This process has taken time due hectic and busy schedule of participants (General Physicians). Survey Questionnaire distributed by random among 450 general physicians who consented to participate in study. The participants were contacted with the help of personal visit, by post, and email. Since the respondents job nature is very busy time and again reminders were sent them to participate in the study and fill out the questionnaire. After number of attempts finally researcher managed to get 310 responses from general physicians working in different public hospitals. This accounts for 60% response rate for study which is quite substantial. In this study all participants were given ample time and freedom to respond without any undue pressure and insistence to get unbiased response.
6.1 Nature of Study Data Analysis

Fundamentally this study stands on the source of SPSS statistical package for social sciences to determine the descriptive scores of study, Pearson’s correlation of Dependent variable with independent variables, and finally exploratory factor analysis. In next phase confirmatory analysis was carried with the help of structural equation modelling (SEM). Structural equation modelling technique partial least square method smart PLS used to assess the measurement model and path model of this study. Smart PLS (SMPLS) avoids parameter biases common in regression analysis and suitable for studies where sample size is not very big (Jorg, 2009). The SMPLS consists of three parts namely inner relation, outer relation, and weight relations (Fornell et al., 1994, Eskildsen et al., 2003 & Wold, 1980). SMPLS is applied in the study due to the complexity of theoretical model and also for the theory confirmation purpose. (Brown et al, 2009).

6.2 Data Screening Before the Analysis

In any research project accuracy and exactness of data is very important to assess the responses of your data population. Data screening is the first step in this regard to determine the accuracy and check for errors. Data screening actually is exercise to check that your set of data is error free. Screening process involves checking for errors such as to check each of your variables for scores which are out of range. Secondly to find errors in data file and check where in data error has occurred, and finally need to rectify errors in the data file itself (Pallant, 2006). The purpose to run data screening is indeed to check what is hidden and reveal the real data in order to purify the data (Hair et al, 2006).

In this research work researcher come across number of issues such as Missing data, Outliers, linearity, normality, Homoscedasticity which may have impact on the relationship of independent variables and dependent variable. In order to have precise and honest view of data it is very imperative to address the above stated issues before running the data for main study and determine the relationships among Independent variables and dependent variable (Tabachnick & Fidell, 2007).
6.2.1 Missing data

Missing data is one of the common problems which one may face during data analysis and it is common happening in social sciences research where in many instance respondents fail to give all information due to number of reasons (i.e.; Length of survey instrument, respondents personal reasons etc)(Hair et al, 2006)

Magnitude and significance of missing data dependents upon missing data pattern and quantity of missing data in research work which one is carrying on. Quantity of missing data is an issue; however the pattern of missing data is more concerned issue (Tabachnick & Fidell, 2007).

In the field of social science research number of strategies suggested dealing with the occurrence of missing data such as applying mean scores on the variance or deleting those respondent samples who have not answered the question (Stevens, 1992, Norusis, 1995).

Where as if only few data points approximately around 5% or less this number is missing in casual pattern one may assume less serious issue and sort it out with any above stated methods. In this case dealing with missing data by applying any of these methods will yield identical outcome. (Tabachnick & Fidell, 2007).

In this study researcher adopted SPSS package to deal with missing values problem and SPSS generated missing data in all questions data is less than 5% of full set of data for analysis. Hence researcher replaced the missing data with mean score which does not cause any concern to over all data pattern (Please see table in appendix-A)

6.2.2 Outliers

Outlier is score which has distinct nature than the rest of the data. This happens with extreme values or combination of scores on more than one variable and causes difference in outcome of statistical score (Tabachnick & Fidell, 2007). Outlier can be detected by checking normally high or low value on variable or a exceptional combination of values across the many variables which make the such observation exceptionally different from the rest of the pattern (Hair et al, 2006)

Outliers are detected on the bases of following categories depending on reason of their exceptionality such as procedural error, observation, extraordinary observation, and ordinary
range. In data entry stage in some instances due to pressure of work procedural error may take place such as mistake in coding or data entry error. In some instance observation occurrence of extra ordinary event by respondent of research question results in the uniqueness of the observation

Another occurrence is extraordinary observation for which researcher has no explanation and clarification. (Hair et al, 2006)

Outlier recognition Methods

Statistical package for social sciences (SPSS) suggest three techniques to find out and identify outliers from research data. Those three methods are

a. Univariate detection

b. Bivariate detection

c. Multivariate detection

a. **Univariate outlier Detection**

Univariate outliers are extreme values on one variable that can be detected by assessing the distribution of observation of each individual variable. In Univariate detection approach basic concern is to establish the threshold of outliers’ designation (Hair et al, 2006)

b. **Bivariate Outlier Detection**

Bivariate outliers can be single out by applying a pair of variables together in scatter plot and if any of those cases which stands out of the range of the other observations will be identified as detached points than rest of observations. However, Bivariate outliers detection method has disadvantage is the potentially large number of scatter plots which arise as the number of variable increases. Hence bivariate detection method is useful only in specific relationship between Independent variable and dependent variable. (Hair et al, 2006). However, in researcher opinion Bivariate detection provide each variables clear outlier pattern and quite useful to understand the outlier trend in data.
c. Multivariate outlier Detection

Multivariate detection as apparent from name is method which involves more than two variables and indicates the limited use of bivariate outlier detection method. Due to multidimensional nature of variables the multivariate detection method to identify outliers in data deems fit and more powerful tool. Mahalanobis D2 measure is used in multivariate detection to assess each variable across a set of variables.

In this test if degree of freedom (df) value exceeds 2.5 in small sample and 3 or 4 in large samples it can be identified as possible outliers. (Hair et al, 2006 & Field, 2006). Outlier has no potential benefit or problem in data analysis however, outliers may cause bias in mean score and inflate standard deviation (Hair et al, 2006 & Field and Hole, 2003).

In this research to detect outlier mahalanobis distance method is followed to see outlier existence in data. Mahalanobis is scaling responses in terms of standard deviations standardise the data with adjustment made for correlations between the variables (Hair et al, 2006). Mahalanobis has critical value level to detect outlier in data depending on the number of dependent value. Critical value for dependent variables and number of independent variables (eight) in this study is 27.88. Based on formula adopted from SPSS Survival Manual (Pallant, 2005, pp251) Mahalanobis outlier detection method is used in this study to detect outlier and found all variables well within the range with the score of 24.842 (see table 14) and indicate that data has no substantial multivariate outlier existence. Graphic plots for each variable for outlier identification are also generated.
Normality refers to the degree to which the distribution of sample data corresponds to a normal distribution. Normality is the basic assumption in multivariate analysis. In other words, normality depicts the shape of data distribution from an individual metric variable and its association to normal distribution. In case of the data distribution is non-normal it makes statistical tests invalid. Hence normality is required to validate statistical significance of output generated. (Hair et al., 2006)

Normality of data can be measured by statistical methods (Tabachnick & Field., 2007 and Hair et al. 2006). In order to assess normality of data distribution, Kurtosis and Skewness and Kolmogorov and Shapiro techniques of SPSS are followed by researcher in this work. In first step, descriptive statistics were applied in SPSS to determine the skewness and kurtosis. (Pallant, 2005) All variables are found in normal distribution range however, Kurtosis and skewness have varying scores (Table15).

Additionally the Kolmogorov and Shapiro test of (Pallant, 2005) was used to see the data normality and results were found significant for all variables under study. Results of Kolmogorov and Shapiro test are in table (Table16). Significance of Kolmogorov and Shapiro test proves the normality of test and confirms that data under study has not violated normality assumptions (Field, 2006)
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<td>1.67</td>
<td>6.67</td>
<td>4.4206</td>
<td>1.03292</td>
<td>-.208</td>
<td>.162</td>
<td>-.557</td>
<td>.322</td>
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<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
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<td>Esteem</td>
<td>310</td>
<td>1.40</td>
<td>7.00</td>
<td>5.0673</td>
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<td>-.815</td>
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<td>.974</td>
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</tr>
<tr>
<td>Effective</td>
<td>310</td>
<td>1.00</td>
<td>6.50</td>
<td>4.5129</td>
<td>1.32431</td>
<td>-.770</td>
<td>.162</td>
<td>-.126</td>
<td>.322</td>
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<td></td>
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</table>

Table 15 Table Descriptive Statistics

<table>
<thead>
<tr>
<th>Statistic</th>
<th>Kolmogorov-Smirnov(a)</th>
<th>Shapiro-Wilk</th>
</tr>
</thead>
<tbody>
<tr>
<td>N</td>
<td>df</td>
<td>Sig.</td>
</tr>
<tr>
<td>Job</td>
<td>.093</td>
<td>310</td>
</tr>
<tr>
<td>Jud</td>
<td>.094</td>
<td>310</td>
</tr>
<tr>
<td>Work</td>
<td>.190</td>
<td>310</td>
</tr>
<tr>
<td>Tra</td>
<td>.140</td>
<td>310</td>
</tr>
<tr>
<td>Esprit</td>
<td>.135</td>
<td>310</td>
</tr>
<tr>
<td>Clarity</td>
<td>.118</td>
<td>310</td>
</tr>
<tr>
<td>Esteem</td>
<td>.115</td>
<td>310</td>
</tr>
<tr>
<td>Emotion</td>
<td>.069</td>
<td>310</td>
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<tr>
<td>Effective</td>
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<td>310</td>
</tr>
</tbody>
</table>

Table 16 Normality assessment

a Lilliefors Significance Correction

Job=Employee Job satisfaction, Jud=Perceived Procedural justice, Task=Job task significance, Tra=Employee job training satisfaction, esprit=Esprit de corps (Team spirit), Clarity=Job clarity, Emotion=Employee emotional stability, Esteem=Employee self esteem, Effective=Employee self efficacy
Linearity

Linearity indicates correlation between variables which are under study in any research work and this correlation depicts straight line relationship (Pallant, 2005, pp.143). Linearity is implicit assumption of all multivariate techniques based on correlational measures of associations, inclusive multiple regression, logistic regression, factor analysis and structural equation modelling as well. (Hair et al, 2006, pp.85). In terms of statistics linearity is determined with help of Pearson’s correlation or scatter plot (Field, 2006; Tabachnick and Fidell, 2007; Hair et al. 2006).

In this study researcher used Pearson’s correlation to examine the relationship between Dependent variable (DV) and Independent Variables (IV). Result of this (Table 17) reveals that all Independent variable are significantly correlated to dependent variable of study which is employee job satisfaction. Hence researcher safely assumes that linearity requirements are fulfilled and all variables are in linear relation on the basis of results drawn from Pearson’s correlation test.

<table>
<thead>
<tr>
<th></th>
<th>Job</th>
<th>Judicious</th>
<th>Training</th>
<th>Esprit</th>
<th>Work</th>
<th>Clarity</th>
<th>Efficacy</th>
<th>Esteem</th>
<th>Neuroticism</th>
</tr>
</thead>
<tbody>
<tr>
<td>Job</td>
<td>1</td>
<td>.518**</td>
<td>.506**</td>
<td>.495**</td>
<td>.350**</td>
<td>.271*</td>
<td>.496**</td>
<td>.312**</td>
<td>-.188**</td>
</tr>
<tr>
<td>Judicious</td>
<td>1</td>
<td>.467**</td>
<td>.512**</td>
<td>.173**</td>
<td>.332*</td>
<td>.601**</td>
<td>.223**</td>
<td>-.081</td>
<td></td>
</tr>
<tr>
<td>Training</td>
<td>1</td>
<td>.361*</td>
<td>.296**</td>
<td>.307**</td>
<td>.518**</td>
<td>.335**</td>
<td>-.152*</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Esprit</td>
<td>1</td>
<td>.282**</td>
<td>.504**</td>
<td>.376**</td>
<td>.102</td>
<td>.004</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Work</td>
<td>1</td>
<td>.331**</td>
<td>.226**</td>
<td>.212**</td>
<td>.016</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Clarity</td>
<td>1</td>
<td>.258**</td>
<td>.056</td>
<td>.127</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Efficacy</td>
<td>1</td>
<td>.275**</td>
<td>-.014</td>
<td>.067</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Esteem</td>
<td>1</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Neuroticism</td>
<td>1</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Table 17 Pearson’s Correlation Test Results
**Homoscedasticity**

In order to understand the dependence of relationship between variables the next important factor to be taken into consideration is the Homoscedasticity. The term Homoscedasticity refers to the assumption that dependent variable demonstrate equal levels of variance across the range of predictor variables. Homoscedasticity is desirable because the variance of dependent variable being explained in the dependence relationship should not be concentrated in only limited range of the independent values (Hair et al., 2006). In other words it can be assumed that Homoscedasticity estimates the variance of dependent variable across the various independent variables of study (Field, 2006). The phenomenon of Homoscedasticity occurs when the residuals in regression specification have equal (Homo) spread (scedasticity). Whereas, any increase, decrease of variance is called hetsoscedasticity (Gujarati, 1992, & Hair et al., 2006).

Homoscedasticity of any data in social sciences and business management is measured by graphical and statistical methods (Hair, 2006 & Field, 2006). According to Tabachnick & Fidell (2007) when data are grouped in any research study then Homoscedasticity is known as homogeneity and to measure homogeneity statistics has procedure. The procedure to measure homogeneity is levene’s test of Homogeneity (Tabachnick & Fidell, 2007).

Researcher for this study applied levene’s test of homogeneity of variance to ascertain the outcome of variability of dependent variable across the independent variables of this study. (Ref: table 18)
Levene’s Test of Equality of Error Variances

<table>
<thead>
<tr>
<th></th>
<th>F</th>
<th>df1</th>
<th>df2</th>
<th>Sig.</th>
</tr>
</thead>
<tbody>
<tr>
<td>job</td>
<td>.832</td>
<td>1</td>
<td>310</td>
<td>.363</td>
</tr>
<tr>
<td>judicious</td>
<td>1.232</td>
<td>1</td>
<td>310</td>
<td>.268</td>
</tr>
<tr>
<td>Tur</td>
<td>2.496</td>
<td>1</td>
<td>310</td>
<td>.116</td>
</tr>
<tr>
<td>Esprtcorp</td>
<td>.190</td>
<td>1</td>
<td>310</td>
<td>.664</td>
</tr>
<tr>
<td>Work</td>
<td>.698</td>
<td>1</td>
<td>310</td>
<td>.404</td>
</tr>
<tr>
<td>clarity</td>
<td>.057</td>
<td>1</td>
<td>310</td>
<td>.812</td>
</tr>
<tr>
<td>Effective</td>
<td>.532</td>
<td>1</td>
<td>310</td>
<td>.466</td>
</tr>
<tr>
<td>Esteem</td>
<td>.457</td>
<td>1</td>
<td>310</td>
<td>.500</td>
</tr>
<tr>
<td>emotions7</td>
<td>2.093</td>
<td>1</td>
<td>310</td>
<td>.149</td>
</tr>
</tbody>
</table>

“Tests the null hypothesis that the error variance of the dependent variable is equal across groups”.

Job=Employee job satisfaction, Judicious=Procedural Justice, Tur=Job training satisfaction, Esprtcorp=Esprit de corps (Team spirit), Work=Working conditions, Clarity=Job clarity, Effective=Employee self efficacy, Esteem=Employee self esteem, Emotions=Neuroticism (emotional stability level)

Table 18 Levene’s Test of Equality of Error Variances

The result in the above table indicate that all variable have fulfilled the requirement of homogeneity and hence researcher take all the independent variables for further analysis and examine the relationship of these variables with dependent variable.

Multicollinearity

Multicollinearity is the extent to which a variable can be explained by the other variables in the analysis. As the Multicollinearity increases, it complicates the interpretation of the data of study under its evaluation. In presence of Multicollinearity among variables it becomes difficult to establish the effect of single variable due to variables interrelationships (Hair et al, 2006). The occurrence of Multicollinearity takes place when variable under study have strong correlation between two or more predictors in regression model (Hair et al, 1992). In order to examine the Multicollinearity effect this study has adopted rather more sophisticated and
robust approach than simply analysing the Pearson’s correlation. Generally those variables which show strong correlation (i.e. .90) indicate Multicollinearity problem (Pallant, 2005).

In this study researcher assessed and diagnosed the collinearity with another approach and detected by the variance inflation factor (VIF) and the tolerance level (TOL) values of independent variables (Pallant, 2005). An acceptable threshold level of VIF is to be less than 10 and TOL values greater than 0.10 (Hair et al., 1992).

In this study researcher has all TOL values above cut off point value 0.10. TOL values in this study ranges from 0.47 to 0.93. Similarly all VIF values are less than cut off point of Value less than 10.00 VIF values ranging from 1.07 to 2.12 for this study respectively. (Table 19)

<table>
<thead>
<tr>
<th>Model</th>
<th>Unstandardized Coefficients</th>
<th>Standardized Coefficients</th>
<th>t</th>
<th>SE</th>
<th>Collinearity Statistics</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>B</td>
<td>Std. Error</td>
<td>Beta</td>
<td>1.221</td>
<td>.224</td>
</tr>
<tr>
<td>1 (Constant)</td>
<td>.595</td>
<td>.488</td>
<td>.159</td>
<td>2.222</td>
<td>.027</td>
</tr>
<tr>
<td>judicious</td>
<td>.140</td>
<td>.063</td>
<td>.169</td>
<td>2.694</td>
<td>.008</td>
</tr>
<tr>
<td>Tra</td>
<td>.264</td>
<td>.052</td>
<td>.265</td>
<td>4.187</td>
<td>.000</td>
</tr>
<tr>
<td>Esprtcorp</td>
<td>.142</td>
<td>.047</td>
<td>.164</td>
<td>3.020</td>
<td>.003</td>
</tr>
<tr>
<td>Work</td>
<td>-.046</td>
<td>.057</td>
<td>-.049</td>
<td>-2.132</td>
<td>.034</td>
</tr>
<tr>
<td>clarity</td>
<td>-.177</td>
<td>.065</td>
<td>-.138</td>
<td>-2.714</td>
<td>.007</td>
</tr>
<tr>
<td>emotions7</td>
<td>.132</td>
<td>.063</td>
<td>.112</td>
<td>2.132</td>
<td>.034</td>
</tr>
<tr>
<td>Esteem</td>
<td>.148</td>
<td>.070</td>
<td>.148</td>
<td>2.132</td>
<td>.034</td>
</tr>
</tbody>
</table>

a Dependent Variable: job satisfaction

Judicious=Procedural Justice, Tra=Job training satisfaction, Esprtcorp=Esprit de corps (Team spirit), Work=Working conditions, Clarity= Job clarity, Effective=Employee self efficacy, Esteem= Employee self esteem, Emotions= Neuroticism (emotional stability level)

Table 19 Levene's Test of Equality of Error Variances

6.4 Demographic Information of Participants

The study sample of this study is General physician working in public hospitals in Pakistan. As stated earlier about 600 general physicians working in Public hospital agreed to participate in study. Out of 600 distributed questionnaire researcher finally received 310 useful questionnaires for data analysis. Since the medical professionals in Pakistan are very
busy professional group therefore it has taken reasonable time period to get response from this group of professionals. Researcher has come across number of problems (i.e. tight job schedule of participants) to collect sufficient number of responses to run it of onward data analysis. Researcher had gone through very hectic and nerves straining effort and finally managed to have substantial number of respondents to analyse the data for this study.

The description about respondents in this study include basic personal information of participants like Gender, Marital Status, Length of service of as General physicians, academic qualification, and age of participants.

Information about participants’ demographic details is available in (Table-20). According to the details most of the participants were Male 65.20 %(202) and 34.80 %(108) were female. In terms of marital status majority of them 222(71.06%) were married and 87(25.10%) stated their marital status as single. Qualification details reveals that 242(78.10) participants had MBBS qualification and 58(18.70) had masters qualification. Length of service or tenure as general physician in public hospital details reveal two groups in high slab 100(32.30%) with 6-10 year service and 90(29%) with 11-20 year length of service respectively. Third major group was 54(17.40%) with 1-5 year length of job as medical practitioner. Age wise most of the participants were in the age group of 26-40 years slabs which accounts for approximately 43%(131).
<table>
<thead>
<tr>
<th>Demographic</th>
<th>Category</th>
<th>Frequency</th>
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</thead>
<tbody>
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<td>Gender</td>
<td>Female</td>
<td>108</td>
</tr>
<tr>
<td></td>
<td>Male</td>
<td>202</td>
</tr>
<tr>
<td>Marital Status</td>
<td>Married</td>
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</tr>
<tr>
<td></td>
<td>Single</td>
<td>087</td>
</tr>
<tr>
<td></td>
<td>Divorced/others</td>
<td>001</td>
</tr>
<tr>
<td>Length of Service</td>
<td>&lt;1 year</td>
<td>46</td>
</tr>
<tr>
<td></td>
<td>1-5 years</td>
<td>54</td>
</tr>
<tr>
<td></td>
<td>6-10 years</td>
<td>100</td>
</tr>
<tr>
<td></td>
<td>11-20 years</td>
<td>90</td>
</tr>
<tr>
<td></td>
<td>&gt;20 years</td>
<td>20</td>
</tr>
<tr>
<td>Academic Qualification</td>
<td>Bachelor/MBBS*</td>
<td>242</td>
</tr>
<tr>
<td></td>
<td>Masters</td>
<td>58</td>
</tr>
<tr>
<td></td>
<td>PhD</td>
<td>10</td>
</tr>
<tr>
<td></td>
<td>Other</td>
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</tr>
<tr>
<td>Age (Distribution)</td>
<td>18-25 years</td>
<td>18</td>
</tr>
<tr>
<td></td>
<td>26-40 years</td>
<td>131</td>
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<td></td>
<td>41-50 years</td>
<td>114</td>
</tr>
<tr>
<td></td>
<td>50+ years</td>
<td>47</td>
</tr>
</tbody>
</table>

*Bachelor in Medicine and Surgery

Table 20  Demographic attributes of sample

6.5  Phase of Data Exploration

Exploratory factor analysis was run to examine the multidimensionality among multi item instrument used in study. Principal component analysis varimax rotation Kaiser Normalisation and eigenvalues applied to the constructs of study. The Kaiser –Meyer –olkin (KMO) value was .845 in accordance with recommended value. The recommended minimum value for Kaiser-Meyer-Olkin is .60(Pallant, 2005) and value in this study is well above this cut off point. Therefore, researcher is well confident that factor analysis is appropriate for this study data. According to Pallant (2006, pp182) Barlett’s Test of Sphericity should be .05 or smaller to have proper factor analysis. This assumption has also been met up with
significance value of (.000) and this confirms the multivariate normality of this data (see table 21)

<table>
<thead>
<tr>
<th>Kaiser-Meyer-Oklin Measure of Sampling Adequacy</th>
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<tbody>
<tr>
<td>Bartlett’s Test of Sphericity</td>
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</tr>
<tr>
<td>Approx. Chi-Square</td>
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</tr>
<tr>
<td>Df</td>
<td>325</td>
</tr>
<tr>
<td>Sig</td>
<td>.000</td>
</tr>
</tbody>
</table>

Table 21: Kaiser-Meyer-Oklin Measure of Sampling Adequacy

According to Floyd and Widman (1995) Items with loading greater than .40 are considered to be substantial and important. Similarly Hair etal (1998) suggest factor loading with score .50 and greater as very significant. Following the above criterion factor analysis with help of Principal component analysis PCA is carried on and following factors extracted for further confirmatory Factor analysis (CFA) assessment

The result of first factor analysis identified six factors. Employee job satisfaction loaded on first factor namely items OLJS1, OLJS7, OLJS2, OLJS6, OLJS5, and OLJS9. The second factor of procedural justice comprised the six items PRJ6, PRJ4, PRJ3, PRJ5, PRJ2, and PRJ1. The third factor is employee job training satisfaction has 3 items with following loading sequence. Training3, Training 1, and Training 2. Fourth factor is esprit de corps or team spirit with items Esprit2, Esprit1, Esprit3, and Esprit4. Fifth extracted factor is Employee job clarity with item Clarity3, clarity2, clarity1, clarity4. The next factor loaded is Task significance with three items namely Workcondition3, Workcondition2, and Workcondition1.

Employee Psychology component has extracted three factors namely employee self efficacy, employee self esteem, and Neuroticism.

The factor employee self efficacy loaded items are efficacy4, efficacy5, efficacy2, efficacy3, efficacy6, efficacy1. The self esteem factor loaded items are esteem1, esteem8, esteem6, esteem3, esteem2, esteem5, esteem4. Neuroticism factor items are Neuro1, Neuro2, Neuro4, Neuro5, Neuro6, and Neuro8
### Rotated Component Matrix

<table>
<thead>
<tr>
<th>Component</th>
<th>Loading</th>
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<tbody>
<tr>
<td>OLJS 1</td>
<td>.8255</td>
</tr>
<tr>
<td>OLJS7</td>
<td>.7963</td>
</tr>
<tr>
<td>OLJS2</td>
<td>.7623</td>
</tr>
<tr>
<td>OLJS6</td>
<td>.7210</td>
</tr>
<tr>
<td>OLJS5</td>
<td>.6591</td>
</tr>
<tr>
<td>OLJS9</td>
<td>.5845</td>
</tr>
<tr>
<td>PRJ6</td>
<td>.8200</td>
</tr>
<tr>
<td>PRJ4</td>
<td>.8185</td>
</tr>
<tr>
<td>PRJ3</td>
<td>.8121</td>
</tr>
<tr>
<td>PRJ5</td>
<td>.8073</td>
</tr>
<tr>
<td>PRJ2</td>
<td>.7728</td>
</tr>
<tr>
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<td>.6024</td>
</tr>
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<td>Training3</td>
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</tr>
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<td>Training1</td>
<td>.6880</td>
</tr>
<tr>
<td>Training2</td>
<td>.6820</td>
</tr>
<tr>
<td>Esprit 2</td>
<td>.7941</td>
</tr>
<tr>
<td>Esprit 1</td>
<td>.6630</td>
</tr>
<tr>
<td>Esprit 3</td>
<td>.6610</td>
</tr>
<tr>
<td>Esprit 4</td>
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</tr>
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<td>.8109</td>
</tr>
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<td>.7510</td>
</tr>
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<td>Clarity 4</td>
<td>.4732</td>
</tr>
<tr>
<td>Work3</td>
<td>.8807</td>
</tr>
<tr>
<td>Work 2</td>
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</tr>
<tr>
<td>Work1</td>
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</tr>
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<td>Efficacy4</td>
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<td>Efficacy5</td>
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<td>Efficacy2</td>
<td>.8112</td>
</tr>
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<td>Efficacy3</td>
<td>.8050</td>
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</table>
Efficacy6 .7965
Efficacy1 .7607
Esteem1 .8437
Esteem8 .8278
Esteem6 .8051
Esteem3 .7594
Esteem2 .7086
Esteem5 .6301
Esteem4 .5984
Neuro1 .8659
Neuro2 .8551
Neuro4 .8058
Neuro5 .7105
Neuro6 .6699
Neuro8 .5764


6.6 Communality Scores of Data

Communality is the estimate of shared or common, variance among the variables as represented by the derived factors (Hair et al, 2006-pp.117). Further Hair and colleagues (2006) argue that communality score is the total amount of variance an original variable shares with all other variables included in analysis. Higher communality values indicate large variance where as small communalities show that substantial portion of the variable is not accounted for by the factors. However, there is no specific small and or large specification parameter for communalities measurement for practical consideration .50 score is often considered significant. (Hair et al, 2006). According to (Field, 2006) the variable which does not share with other variables have communality score 0 and variable which has no variance would score 1 communality score. In this work researcher has taken all variable items having communality score above .50 as threshold point. (Please see communality Index)
# Communality Index

## Communalities

<table>
<thead>
<tr>
<th>Item</th>
<th>Initial</th>
<th>Extraction</th>
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<td>.799</td>
</tr>
<tr>
<td>oaljs2_1</td>
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<td>.685</td>
</tr>
<tr>
<td>oljs5_1</td>
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<td>.614</td>
</tr>
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<td>oljs6_1</td>
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</tr>
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</tr>
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</tr>
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</tr>
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Table 22: Communality score Extraction Method: Principal Component Analysis
6.7  Structural Equation Modelling

The Model analysis of this study is based on the Structural Equation Modeling. The Structural Equation Modeling is a comprehensive strategy to test hypotheses relationship among Exogenous and Endogenous variables.

Structural equation modelling Partial Least Square method of analysis is followed in this study and literature suggest Partial least square method is edge in the studies which involve more realistic and social science research settings (Garcia, 2009). In its essence Partial Least square Method PLS is a structural equation Modelling (SEM) technique similar to covariance- based SEM( Garcia, 2009)and this kind of model analysis approach concurrently tests both path and measurement model and assists in developing more realistic assumptions. Since in this study research is primarily concerned to examine the prediction of dependent variable and focus is placed on the explanation of endogenous construct which makes application of Partial least square method suitable in this study (Birkinshaw etal, 1995 & Festge etal, 2007).

6.8  The Measurement Model Analysis

The vigour and dynamics of measurement model is determined with help of measures of validity and reliability. Validity determines how well the concept defined and reliability checks the consistency of measures.

In this study researcher assessed the measurement model with help of convergent and Discriminant validity. Convergent validity is the extent of association of two maximally different scales which measure the same concept and determine the reliability of items and constructs (Krathwohl, 1997).Whereas Discriminant validity denotes to whether the scale is different from the other scale which measure maximally different concept (Kiel etal, 2000).Similarly Discriminant validity determines whether the scale is differentiated from other scales that measure a different concept. Additionally the Average variance extract which is sensitive to convergent validity can be used to determine Discriminant validity (Fornell, 1981).Another means to assess discriminant validity is to check the factor loading of each indicator and every indicator should load higher on the construct of interest than any other variable(Thatcher etal,2002)
6.9  Item Reliability Appraisal

Reliability denotes to whether the measurement scale is consistent and stable. In other words reliability is “The extent to which results are consistent over time and an account representation of total population under study is referred as to reliability” (Joppe, 2001-pp01). According to (Cronbach, 1951) reliability is the level to which the respondents can answer the same or nearly the same questions the same way every time. All items used by researcher in this study are taken from literature and have reliable scores time and again; the PLS measure scale reliability was also checked by examining the loadings of each item and by measuring the correlation between each item and its corresponding construct. Chin (1998) suggests the item loading and item constructs correlation score should be minimal 0.60 and 0.50 might be considered if some other items measuring the same construct with high scores.

Establishing the foundation of PLS measurement analysis for items loadings and item construct correlation the score suggested by Chin (1988) are taken up in this study as threshold. All items loading in below mention(table 23) are in compliance of this criterion and fulfil the requirements of reliability and validity.
<table>
<thead>
<tr>
<th>Construct</th>
<th>Item</th>
<th>Item Loading</th>
<th>Item Construct Correlation</th>
<th>Construct</th>
<th>Item</th>
<th>Item Loading</th>
<th>Item Construct Correlation</th>
</tr>
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<td>0.759650</td>
<td><strong>Self Esteem</strong></td>
<td>Sest1</td>
<td>0.723617</td>
<td>0.700795</td>
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<td></td>
<td>JS2</td>
<td>0.714471</td>
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<td></td>
<td>Sest2</td>
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<td>0.816487</td>
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<td>0.745741</td>
<td></td>
<td>Sest3</td>
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<td>0.771067</td>
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<td>0.690558</td>
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<td>Sest5</td>
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<td>0.704880</td>
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<td>0.766959</td>
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<td>0.732177</td>
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<td></td>
<td>PRJ2</td>
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<td>0.892502</td>
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<td>0.705112</td>
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<td>0.763676</td>
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<td>0.843150</td>
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<td>0.889355</td>
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<td>PRJ5</td>
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<td>JBT1</td>
<td>0.782763</td>
<td>0.775803</td>
<td><strong>Neprit de corps</strong></td>
<td>Espr1</td>
<td>0.801219</td>
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<td>0.793218</td>
<td></td>
<td>Espr2</td>
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</tr>
</tbody>
</table>

Table 23: Item Reliability: - SEM measure for item loading and construct item correlation.
6.10 Construct Reliability Measurement.

Construct reliability is the ability of manifest variables to tap similar underlying construct (Krathwohl, 1997). Construct reliability (CR) is the measure of reliability and internal consistency of the measured variables representing a latent construct (Hair et al., 2006-pp771). Construct reliability (CR) value is often used in conjunction with structural equation modelling (SEM). Construct reliability is computed from the squared sum of factor loadings for each construct and the sum of error variance terms for a construct. The rule of thumb for good construct reliability is .7 or higher suggests good reliability. However, scores between .6 and .7 are workable provided that the other constructs of model have good reliability scores. In short, construct reliability should be .7 or higher to indicate adequate convergence or internal consistency (Hair et al., 2006).

Average variance extracted (AVE) on other side is a summary measure of convergence among set of items corresponding a latent construct (Hair et al., 2006). Average percentage of variance extracted can be calculated simply using standardising loadings or in simple word it is the average squared factor loading. Average variance extract (AVE) less than .5 indicates that on average, more error remains in item than variance (Hair et al., 2006). The AVE measure the variance captured by the indicator relative to measurement error and to use a construct, AVE score should be .50 or more is desirable. (Fornell, 1981 & Chin, 1998). Cronbach alpha (α) measures how well set of items measure a single latent construct. Alpha measures reliability which ranges from 0 to 1, with values of .60 to .70 as minimum limit of acceptability. However, in case of scale with large number of items stringent conditions of minimum score be followed (Hair et al., 2006). All construct of this study had composite reliability above .70 and had average variance extracted score above .50 cut off value and similarly alpha Cronbach (α) score above .60 which indicates that constructs used in study has fulfilled composite reliability condition and has adequate reliability.
Alpha Cronbach (α) measure of construct measured with SPSS. Composite Construct Reliability (CCR) and Construct Extracted Average Variance (AVE) obtained through Factor analysis.

<table>
<thead>
<tr>
<th>Construct</th>
<th>Construct Composite reliability</th>
<th>Construct Average variance Extracted</th>
<th>Construct Cronbach Alpha(α)</th>
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</thead>
<tbody>
<tr>
<td>Job satisfaction(JS)</td>
<td>0.852099</td>
<td>0.535608</td>
<td>0.782944</td>
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<td>Procedural Justice(PRJ)</td>
<td>0.928296</td>
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<td>0.907210</td>
</tr>
<tr>
<td>Job Training(JBT)</td>
<td>0.830563</td>
<td>0.620361</td>
<td>0.696161</td>
</tr>
<tr>
<td>Esprit de corps(Espr)</td>
<td>0.843185</td>
<td>0.574851</td>
<td>0.750477</td>
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<td>Job Clarity(JCla)</td>
<td>0.901398</td>
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<td>Self esteem(Selest)</td>
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<td>Self efficacy(Seff)</td>
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<td>0.886696</td>
</tr>
<tr>
<td>Neuroticism( Neuro)</td>
<td>0.819849</td>
<td>0.505120</td>
<td>0.711805</td>
</tr>
<tr>
<td>Working conditions</td>
<td>0.929790</td>
<td>0.815352</td>
<td>0.886730</td>
</tr>
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</table>

6.11 Item correlations

Items correlations of all items measuring each construct of the study were computed. In this study as mentioned in (Table 24), each item correlates more highly with other questions measuring the same construct than with other items measuring the other construct which confirms the Discriminant validity (Hair etal, 2006). In addition to determine the confirmatory factor analysis with the support of SMPLS has also confirmed the validity by verifying each items loading in its assigned construct higher than on any other constructs (Gefen, 2000). Bootstrap application is used to generate the T-Value scores of item loading. In this study researcher has had found the all items had higher loading in their assigned constructs than in other constructs under study (please see table 24). This indicates that Discriminant reliability assumption is fulfilled.
6.12 Construct Validity

The term validity represents the degree to which a set of measures exactly correspond to the concept of the study which they are supposed to characterise. In simple terms validity of measure is the degree to which set of measurement is free from any systematic error or non random error (Hair et al, 2006). Construct validity creates basis for determined score analysis (Krathwohl, 1997-pp446). Constructs used in this study by researcher are well defined and measured by using established scales from well established literature. However, still measures used in this study by researcher need to be validated. Coefficient correlation between each variable and its associated items carried on by applying Pearson’s correlation coefficient test. (Krathwohl, 1997). A significant correlations were found for majority of model variables and associate items.

Significant correlation was found between number organisational attributes and employee psychology variable. Relatively high correlation was found in following organisational attributes and employee psychology variables

**Organisational Attributes**

Perceived Procedural Justice (0.518**)

Job Training satisfaction (0.506**)

Esprit de corps (Team spirit) (0.495**)

**Employee Psychology**

Employee self esteem (0.312**)

Self efficacy (0.496**)
Construct
Training

Self
Efficacy

Work
Condition

Job
clarity

Esprit
De corps

Neuroticism

Job
satisfaction

Justice

Self
Esteem

Item

Clarity

Efficacy

Tra1

0.3193

0.3954

Tra2

0.1739

Tra3

0.1974

Effi1

0.1249

Effi2

Esprit

Esteem

Job

Justice

Neurotic

0.3593

0.3974

0.4261

0.4146

-0.1711

0.375

0.2707

0.1997

0.4339

0.3093

0.4038

0.2123

0.2913

0.3447

0.3411

0.7713

0.2894

0.2948

0.4699

0.249

0.8511

0.3176

0.2927

Effi3

0.229

0.8137

0.2827

Effi4

0.222

0.7776

Effi5

0.1895

Effi6

Work

Training

0.2223

0.7829

-0.1772

0.2981

0.7969

-0.0969

0.1815

0.7831

0.4527

-0.0171

0.1588

0.3725

0.5148

0.5097

-0.0451

0.2067

0.4316

0.2367

0.3857

0.4508

0.0656

0.1667

0.3876

0.2127

0.1477

0.3235

0.5145

0.0861

0.1613

0.3882

0.7712

0.2588

0.1302

0.2773

0.5153

0.0021

0.093

0.4086

0.2236

0.7928

0.3405

0.2291

0.3603

0.5902

0.0157

0.2051

0.385

Work1

0.3114

0.1954

0.1861

0.2512

0.2754

0.1509

-0.0001

0.8837

0.2587

Work2

0.2712

0.195

0.2790

0.2615

0.3101

0.1145

0.0116

0.9231

0.279

Work3

0.2442

0.1868

0.2999

0.1815

0.2906

0.1837

-0.0292

0.9017

0.2798

clarity1_1

0.8414

0.2376

0.4854

0.1137

0.2366

0.3104

0.0487

0.271

0.1752

clarity2_1

0.8876

0.2676

0.4306

0.0833

0.2208

0.3531

0.0765

0.273

0.3371

clarity3_1

0.8737

0.1659

0.419

0.1198

0.2309

0.2801

0.091

0.2475

0.2592

espr1_1

0.5146

0.3563

0.8099

0.2003

0.3977

0.4521

-0.0395

0.1825

0.3292

espr2_1

0.394

0.3406

0.8175

0.136

0.3537

0.4509

0.0865

0.2551

0.3595

espr3_1

0.3342

0.2834

0.7029

0.1283

0.3462

0.3736

0.0141

0.1961

0.3126

espr4_1

0.2998

0.1055

0.6935

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0.3641

0.2852

-0.0346

0.2305

0.0951

neuro2_1

0.0248

0.0275

-0.0501

0.0378

-0.117

0.0306

0.6145

0.0008

-0.105

neuro6_1

0.0515

0.0239

-0.0307

0.0853

-0.1136

-0.1123

0.6191

0.0766

-0.1266

neuro7_1

0.0776

0.0034

0.0432

-0.1786

-0.2111

-0.1259

0.8424

-0.0454

-0.1868

oaljs1_1

0.1014

0.306

0.2046

0.3317

0.7692

0.3194

-0.2499

0.2451

0.4383

oaljs2_1

0.1566

0.3579

0.3353

0.3324

0.7140

0.3718

-0.1186

0.2123

0.3961

oljs5_1

0.2614

0.3611

0.3815

0.3115

0.7413

0.3103

-0.0853

0.303

0.3867

oljs6_1

0.2692

0.3621

0.459

0.2188

0.7259

0.4141

-0.1158

0.2543

0.2971

oljs9_1

0.1751

0.4561

0.3771

0.1844

0.707

0.4821

-0.2044

0.174

0.3673

prjs1_1

0.1645

0.4509

0.3874

0.1769

0.4735

0.7295

-0.1302

0.0973

0.2526

prjs2_1

0.3326

0.5257

0.5295

0.1942

0.5233

0.8898

-0.1594

0.1915

0.3738

prjs3_1

0.3993

0.5427

0.4406

0.2952

0.4239

0.8512

-0.0377

0.1193

0.3744

prjs4_1

0.3265

0.5654

0.3869

0.1783

0.3761

0.8391

0.0037

0.148

0.4114

prjs5_1

0.2645

0.4968

0.3937

0.1158

0.3656

0.806

-0.1636

0.0775

0.4681

prjs6_1

0.3155

0.5411

0.3933

0.2631

0.381

0.8381

0.0184

0.1716

0.3901

sest1_1

-0.0017

0.1181

-0.0553

0.7235

0.1657

0.1315

-0.1282

0.2182

0.2895

sest2_1

0.1616

0.3184

0.2079

0.8261

0.3953

0.3029

-0.0609

0.2419

0.3777

sest3_1

0.0188

0.2225

0.0848

0.7850

0.2478

0.1455

0.0454

0.163

0.2466

sest5_1

0.0409

0.1415

0.0073

0.7038

0.2418

0.154

-0.1128

0.0862

0.1884

sest6_1

0.1767

0.1535

0.1334

0.6650

0.1754

0.0349

-0.0007

0.2046

0.1781

Table 24 Construct item correlations

170


6.13 PLS Results Bias and Significance

Partial least square method of structural equation modelling uses a variance base approach and in case of inadequate sample results of data analysis by PLS might be biased towards higher estimates in the measurement model at the expense of lower estimate path coefficients in the structural model (Chin, 1998). In order to tackle this predicament of biasness in results, the sample size should be at least 10 times to the number of independent constructs (8 in this study) affecting the dependent construct (chin, 1998). In this study researcher has sample size of (310 participants) and in case of any bifurcation for each group has large enough sample to overcome this limitation as largest number of independent constructs in this study used by researcher are eight. Significance level refers to as the statistical significance; the level of significance which represents the probability the researcher is willing to accept this also known as Type I Error. In other words this denotes the chance the researcher is willing to take of being wrong about whether the estimated coefficient is different from zero. In research most widely used and typical level of significance is .05 and researcher has followed this parameter in order to assess the significance level in this study to avoid any sensitive and spurious effect problems (Hair etal, 2006-pp174/126). Statistically significant indicates the relationship between two measures is strong and dismisses the possibility that it is due to pure chance. The significance level usually at and 0.10, 0.01, .001 makes a large chance of being wrong (Hair etal, 2006).

6.14 Structural Model Analysis

The assessment of structural model and explanatory power of structural model is determined by using PLS technique of structural equation modelling. The explanatory power is determined by looking at \( R^2 \) value, path coefficient, and T-values. T value term used in PLS assessment is PLS specific which express relation between measurement variables and corresponding latent variables, and it should not be mixed up with the T-test for comparing two conditions.
R² Value

The value of R² (variance accounted for) represent the percentage of variance which independent variables explain in dependent variable (Keil et al, 2000). The overall data set of organisational attributes and employee psychology explains 49% variance in employee job satisfaction. R² values are highest in esprit de corps (team spirit), working conditions, employee self esteem, employee self efficacy, followed by job training satisfaction and perception of procedural justice in organisation. This suggest that model mainly provides explanation of the variation of the team spirit (esprit de corps), working conditions, employee self esteem, on the largest degree, followed by Job training, employee self efficacy, and perception of procedural justice to explain the variance in employee job satisfaction. In addition the Espr>Jobsats, Work>Jobsats, and self esteem>jobsats path coefficient are highly significant and explain 58% variance in employee job satisfaction followed by Self efficacy > Jobsats, Job training>Jobsats, and Procedural justice>Jobsats path coefficient which explain about 48% in employee job satisfaction. The result of model testing suggests and provides empirical support for the relationship posted in the model, and explaining about 49% variance in employee job satisfaction. Both organisational attribute factors like Team spirit (esprit de corps), Job training, perception justice and employee psychology factor like self esteem, and self efficacy contribute significantly to the explanation of employee job satisfaction (Srite et al, 2007). The satisfaction model in other studies (Srite et al, 2007), reported about 60% variance among the large US state university sample and approximately 59% variance in case of Nordic countries sample (Eskildsen, 2003). Hence it can be argued that structural model proposed in this study possessed an average explanation power compared with other studies in same research thread.

6.15 Path coefficient and T-value

PLS applies a Boot strip procedure to assess T-value for each path in the structural model, where each path indicates a hypothesis and T-value express the relation between the measurement variable and corresponding variables (Chin1998). Justification and validity of each hypothesis is determined by examining the statistical significance of the T-value for its corresponding path. The acceptable T-value is 1.96 with the significance level of 0.05 (Hair et
al, 2006-pp. 390). Screen captures of PLS software for model items loading are illustrated in Appendix.

<table>
<thead>
<tr>
<th>Link</th>
<th>Path coefficient</th>
<th>T-value</th>
<th>R²</th>
</tr>
</thead>
<tbody>
<tr>
<td>Justice&gt;Jobsats</td>
<td>0.141</td>
<td>2.41</td>
<td></td>
</tr>
<tr>
<td>Job training&gt;Jobsats</td>
<td>0.149</td>
<td>2.43</td>
<td></td>
</tr>
<tr>
<td>Esprit&gt;Jobsats</td>
<td>0.261</td>
<td>4.625</td>
<td>0.490</td>
</tr>
<tr>
<td>Work&gt;Jobsats</td>
<td>0.116</td>
<td>2.631</td>
<td></td>
</tr>
<tr>
<td>Job clarity&gt;Jobsats</td>
<td>0.057</td>
<td>1.548</td>
<td></td>
</tr>
<tr>
<td>Self esteem&gt;Jobsats</td>
<td>0.157</td>
<td>2.525</td>
<td></td>
</tr>
<tr>
<td>Self efficacy&gt;Jobsats</td>
<td>0.198</td>
<td>2.647</td>
<td></td>
</tr>
<tr>
<td>Neuroticism&gt;Jobsats</td>
<td>-0.161</td>
<td>2.781</td>
<td></td>
</tr>
</tbody>
</table>

Table 25 The overall data set with structural parameter Values

6.16 The overall view of findings

The overall data shows that from Organisational attributes the variable of Esprit de corps (Team spirit) has relatively significant impact on employee Job satisfaction level Esprit de corps(t=4.625, p<0.01). This finding suggest that esprit de corps or team spirit feeling among the organisation employees will have greater impact on their job attitude (i.e.; Job satisfaction). This result proposes that Esprit de corps (Team spirit) among employees increases employees’ motivational level and they experience more job satisfaction. Hence Hypothesis H3 is supported.

The result propose that working condition has positive effect on employee job satisfaction (t=2.631, P<0.01). This suggests that conditions of working place and comfort level at work may increase or reduce employee job satisfaction. This finding is accordance with proposed hypothesis and therefore H5 is supported.
The path coefficient and t value indicate that Job training satisfaction has positive correlation to employee job satisfaction (t=2.43, p<0.05). This propose that satisfaction with job training opportunities increase job satisfaction level as well. Hence the Employee job training with path coefficient 0.149 scores reveals the positive relationship with employee job satisfaction and proposed Hypothesis H2 is supported.

Employee perceived procedural justice perception findings show path coefficient score of 0.141 with (t=2.41, P<0.05). This reveals the statistical significance of perceived procedural justice to explain variance to employee job satisfaction. This shows that as the perception of employee for organisational justice improves his employee job satisfaction also increases. This justifies researcher proposition of positive correlation between employee job satisfaction and procedural justice and therefore Hypothesis H1 is supported.

The next variable of study is the job clarity and it is proposed that Job clarity is positively and significantly correlated to employee job satisfaction. The assessment structural equation modelling between the predictor of employee job clarity and employee job satisfaction as dependent variable showed that job clarity is not significantly correlated to employee job satisfaction.

The path coefficient score shows 0.057 significance with (t= 1.584, P<0.05). The result shows that influence of independent variable job clarity for job satisfaction were not found to positively and significantly correlated and hence proposed hypothesis H5 is not supported.

The analysis regarding the relationship of between the construct of employee psychology as independent predictor and employee job satisfaction as dependent variable reveals that employee self esteem variable, employee self efficacy variable , and neuroticism variable are predictors for the dependent variable.

The first independent predictor of that construct such as employee self esteem was found to be positively and significantly correlated to dependent variable employee job satisfaction with path coefficient score 0.157 (t=2.525, P<0.05). This result signifies the relationship between the employees self esteem fulfilment and employee job satisfaction level and hence Hypothesis H6 is accepted.

The second independent predictor in employee psychology constructs namely employee self efficacy trait was also found to be positively and significantly correlated to employee job satisfaction 0.198(t=2.64, P<0.01). This finding is accordance with proposed hypothesis that
employee self efficacy is positively correlated to employee job satisfaction level and there for Hypothesis H7 is accepted.

The third predictor of employee psychology constructs such as Neuroticism or lower emotional stability is proposed to be negatively correlated to employee job satisfaction were also found to be significantly negatively correlated to employee job satisfaction - 0.161(t=2.71,P<0.01) H8 accepted.

6.17 Summary of Results

Hypothesis 1
Employee perception of procedural justice is positively and significantly correlated to employee job satisfaction (Supported)

Hypothesis 2
Job training satisfaction is positively and significantly correlated to employee job satisfaction (supported)

Hypothesis 3
Working conditions are significantly correlated to employee job satisfaction (supported)

Hypothesis 4
Esprit de corps (team spirit) is positively correlated to employee job satisfaction level (supported)

Hypothesis 5
Job clarity has positive significance correlation to employee job satisfaction (not supported)

Hypothesis 6
Employee self esteem has significant and positive influence to employee job satisfaction (supported)

Hypothesis 7
Self efficacy is positively and significantly correlated to employee job satisfaction (supported)

Hypothesis 8
Neuroticism trait is negatively correlated to employee job satisfaction level (supported)
Chapter Seven: Discussion of the Main study

7.0 Introduction

The objective of this study is to predict the impact of organisational characteristics (i.e., procedural justice, training, team spirit, working conditions, job clarity), and employee personality aspects (i.e., self-efficacy belief, self-esteem, neuroticism) on the dependent variables, which are employee motivation and job satisfaction. These variables were examined from a motivational perspective in order to understand their impact on employee job attitudes such as job satisfaction. The study gathered data on the basis of a cross-sectional approach at one point in time. The researcher collected data for the study from public employees working as general physicians in different public hospitals in Pakistan.

In this study the researcher, following the literature review, developed the thesis hypotheses. These hypotheses are based on the relationship between independent predictors and the dependent variables of the study. The results of this thesis provide empirical evidence that employee job clarity, task significance, and employee personality aspects of locus of control are not significant determinants of employee job attitude such as job satisfaction. On the other hand, the positive significant correlation between procedural justice, training, teamwork, work conditions, employee self-efficacy and self-esteem was predicted for employee job satisfaction. Furthermore, the significant negative correlation between the employee personality trait of neuroticism and employee job satisfaction was predicted by this study.

This chapter consists of the following: first, the data entry, coding, cleaning and related matters are highlighted; second, information is given regarding matters pertaining to scale purification; third, an examination of the findings derived from the work attribute/characteristics construct of the study is presented. In the final part of the chapter, the results are derived from hypotheses that were developed from employee personality aspects, as discussed.
7.1 Data Entry and Sample

In any research project, the accuracy and exactness of the data is very important to assess the responses of the data population. Data screening is the first step to determine this accuracy, an exercise to check that the set of data is error free. The screening process involves checking for errors such as examining each of the variables for scores that are out of range. Other processes include finding errors in the data file and checking that the data error has occurred, and finally, rectifying errors in the data file itself (Pallant, 2006). The purpose of data screening is to check what is hidden and to reveal the real data in order to purify it (Hair et al., 2006).

In this study the researcher came across a number of issues such as missing data, outliers, linearity, normality, homoscedasticity, all of which may have an impact on the relationship of independent variables and dependent variables.

Missing data in a sample may have an impact on findings if the missing data is more than 5% of the total data under analysis. In this study, the missing data was less than 5% of the total sample and hence such data has been replaced with mean value got further data analysis in order to keep data safe from any misrepresentation (Stevens, 1992; Pallant, 2007). The missing data amounts to less than 5% of the total available data and therefore does not make a substantial impact on the outcome of the analysis. In any study the problem of missing data may exist due to procedural errors, computer malfunction, or participants not responding to a question.

Outliers are observations that are very different from others in the given data. Outliers may have an impact on analysis and cause bias in calculations such as the mean (Field, 2005). According to Hair et al. (2006), outliers may have no beneficial or problematic impact on data analysis. However, it will impact on the mean score and standard deviation. Therefore, the researcher should be aware of the existence of outliers in the data (Field, 2006). In this study, the Mahalanobis method of outlier detection was adopted (Pallant, 2005 p.251), which confirms that the data has no substantial multivariate outliers.

Graphic plots of each variable for outlier identification were also generated. In the box plot, outliers were identified by the asterisk symbol. However, the data for this study consists of a very limited number of multivariate outliers in the full set of data generated for analysis. Data
linearity, normality, and a homoscedasticity test were also run to determine the relationship between independent predictors of study and endogenous variables of the study.

7.2 Review of the Scale Measurements Applied in the Study

The scales applied in the study by the researcher were based on the conceptual model developed with the support of the literature. Employee job satisfaction, perceived procedural justice, teamwork, training, and employee personality aspect scale such self-efficacy, self-esteem, and neuroticism were based on the conceptual framework of the study. Hence, the first concern to be addressed was to validate the concepts in the study. The pool of items adopted was first quantitatively refined by the researcher. In the first phase, the researcher conducted a pilot study to check the reliability of the scale so that its face validity could be determined. In addition, the scales used in the study were assessed and examined with the support of several statistically rigorous tests. Exploratory factor analysis (EFA) was carried out and then followed by factor analysis, which included strict analysis such as convergent validity, discriminant validity, composite reliability, Cronbach’s alpha reliability and average variance extract evaluation. Consequently the study developed theoretically and operationally valid and reliable scales and with those scales, hypothesis testing was performed. The satisfactory response rate in the questionnaire survey and low-levels of missing data indicate that the scale developed for the study was acceptable to participants to complete.

Overall, the scales developed for the study were found to be reliable and valid in terms of their accuracy and hence were applied by the researcher to test the study hypotheses. The pilot study generated some suggestions from the participants and helped to make the survey instrument more understandable. In the demography section, according to the suggestion made in the pilot study regarding the item on educational qualifications, the Bachelor degree was substituted with the qualification, Bachelor in Medicine and Surgery (MBBS). In the scale of employee self-efficacy, the phrase ‘As an individual’ was added to all the items to improve understanding of the scale items for participants as suggested in the pilot study. The inclusion of this phrase helped participants to understand more easily the self-efficacy scale items.
All the constructs applied in the study have fulfilled the uni-dimensionality feature that is consistent with the findings drawn from literature. Uni-dimensionality can be described as the existence of one construct underlying a set of items (Steenkamp et al., 1991). However, in this study, a small number of factors were not loaded accordingly in the group of study variables. Consequently the researcher followed the approach of ‘Take what the data gives you’, as suggested by Hair et al. (2006) for the purpose of hypothesis testing. Two factors, one from employee personality aspects and one from organisational characteristics, had low scores and did not emerge as significant to be loaded in the group in this analysis. The employee personality aspects factor, locus of control, (Levenson, 1974) was not loaded in its assigned construct. It is worth mentioning that three other personality aspects, i.e., employee self-efficacy belief, employee self-esteem, and neuroticism, were loaded to their assigned construct to predict employee job satisfaction (Judge et al., 2001; Srivastava et al., 2010; Judge, 1998). This issue addresses in particular the concern that employee job satisfaction is, in part, based on employee disposition and how employees attempt to manage their reactions to work settings (Judge et al., 2001; Capara et al., 2006; Bono et al., 2003).

Similarly the work characteristics factor of Task significance to predict employee job satisfaction adopted from the study of Campion et al. (1993) was analysed to measure employee perception of task significance. The researcher applied task significance to examine how the impact of task worth can affect employee job motivational levels. In the exploratory factor analysis (EFA) no single factor emerged for task significance variable and thus the researcher decided to withdraw this variable from the study for any further analysis. The rest of the variables for work characteristics, such as procedural justice, job training, job clarity, teamwork and working conditions, and employee personality variables such as self-efficacy belief, self-esteem, and neuroticism, were grouped in their assigned constructs.

The scale analysis reveals and highlights issues that need to be addressed, such as how the scale is adopted and applied in different regions and societies. This anticipates the requirement to examine the relevance of the context of the scale to attain the validity of that assumption. A lot of what is important about theories, constructs and scales developed in one context can be generalised to other countries (Gurhan et al., 2000; Singh, 1995; Sharma et al., 1995; Sharma et al., 2003). The requirement to understand the extension and generalisability of theory and its allied constructs in other country studies suggest the assessment analysis. According to Douglas & Craig (1997) and Hui & Triandas (1995), in order to understand the
extent of the theories and their allied constructs, the foremost step is to measure the degree to which a given scale is cross-nationally variant.

Measurement Variance refers to ‘whether or not, under different conditions of observing and studying trend, measurement operations produce measures of the same attribute’ (Horn et al., 1992). At the same time, researchers suggested applying confirmatory factor analysis (CFA) to measure variance of scale and argue cross-validity of scale in different contexts with multiple methods. Application of multi-method allows the development of better scales which have conceptual and measurement equivalency across countries (Singh, 1995; Steenkamp et al., 1995; Sharma et al., 2003). Cross-validation is a prerequisite for a uni-dimensional measurement instrument on new data. It eliminates the possibility that one has capitalised on chance (Cudeck et al., 1983). Churchill (1979) suggests that new data should be applied to cross-validate reliability and it is presumed that items with reliability also hold method convergent validity; whereas Gerbing et al. (1988) recommend that method convergent reliability should be obtained before reliability is assessed. However, in this study the researcher examined Cronbach’s alpha construct validity and convergent validity that is an indispensable precondition for further theory testing and theory development (Sharma et al., 1995; Steenkamp et al., 1991; Carmines et al., 1979).

### 7.3 Statistical Techniques used for to generate Outcome

<table>
<thead>
<tr>
<th>Test Applied</th>
<th>Purpose</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cronbach Alpha</td>
<td>Measure the reliability of multi item constructs</td>
</tr>
<tr>
<td>Mahalanobis</td>
<td>Used to detect outlier existence among more than one variables</td>
</tr>
<tr>
<td>Kurtosis and Skewness</td>
<td>To assess the normality of data</td>
</tr>
<tr>
<td>Pearson’s correlation</td>
<td>To check the linearity which indicates correlation between variables</td>
</tr>
<tr>
<td>Levene’s test of homogeneity</td>
<td>In order to exam that dependent variable demonstrates equal levels of variance across the range of predictor variables.</td>
</tr>
<tr>
<td>variance inflation factor (VIF) &amp; Tolerance level (TOL)</td>
<td>This test used to check the existence of Multicollinearity</td>
</tr>
<tr>
<td>Barlett’s Test of Sphercity</td>
<td>To see if using factor analysis is appropriate</td>
</tr>
<tr>
<td>Principal Component Analysis</td>
<td>To check that how factors load on their assigned constructs</td>
</tr>
<tr>
<td>Structural Equation Modelling</td>
<td>concurrently tests both path and measurement model</td>
</tr>
</tbody>
</table>
7.4 Predictors of employee job satisfaction: The impact of organisational work attributes on employee job satisfaction

This study is based on examining employee behaviour, attitudes and perception in relation to employee job satisfaction. In this study the researcher examined job satisfaction predictors among doctors working in Pakistan. The job satisfaction of doctors working in public hospitals in Pakistan is concerned with the reaction of doctors to their work. The work-life environment of doctors at this time is undergoing a profound change and over a period of time even more changes are likely to emerge. Little attention has been paid to the impact of the professional self-image of doctors on healthcare conditions for patients and how attractive the work of a doctor is perceived to be (Gothe et al., 2007; Patrick et al., 2003).

In literature, work characteristics such as organisational justice have been considered as one of the important predictors that influence employee job satisfaction. Job satisfaction has been a central theme of organisational studies over the years; scholars have directed their attention toward the role of organisational justice in forming very important work attitudes such as employee job satisfaction (Clay et al., 2005; Colquitt et al., 2001). In the field of organisational studies, justice is defined as an act that is just if most individuals perceive it to be (Cropanzano et al., 1997). Justice in organisations stems from the antecedents and consequences of two kinds of subjective perceptions of employees: 1) fairness in outcome distributions 2) fairness of the procedures applied to outcome distributions or allocations. In this study the researcher has specifically examined the impact of fairness procedures applied to outcome distribution on employee job satisfaction. This form of justice is classically named as ‘procedural justice’ (Cropanzano et al., 1997; Leventhal et al., 1980; Colquitt et al., 2001). As organisational studies on organisational justice has proliferated, so too have the different dimensions of justice, particularly procedural justice. Leventhal et al. (1980) are the pioneers of the notion of procedural justice and its application in organisational work settings. They identified six broad characteristics to determine procedural justice far beyond the concept of fair process control. According to Leventhal et al. (1980), the criteria for procedures should (a) be applied consistently across people and across time (b) be free from bias (c) ensure that accurate information is collected and used in making decisions (d) have the means to rectify flawed or inaccurate decisions (e) in accordance with personal and prevailing standards of morals (f) guarantee that the opinions of various groups affected by the decision have been taken into consideration (Colquitt et al., 2001; Leventhal et al.,1980).
Employees develop a positive attitude and express enjoyment regarding their work on the basis of fairness in procedures adopted by employers in an organisation (Linda & Tyler, 1988). McFarlin & Sweeney (1992), Martin & Bennet (1996), Lissak et al. (1983) and Alexander et al. (1987) in their findings from samples of employees working in financial institutions, the air force, and government employees, support the view that the perception of justice by the employee in an organisation and the fulfilment of justice can result in employee job satisfaction. Procedural justice significantly influences employee job satisfaction and the existence of fair procedure for the distribution of organisational rewards can have a very strong impact on job satisfaction, work-life quality, and organisation efficiency (Alexander et al., 1987).

This study applied organisational justice predictors of procedural justice as an independent predictor to examine employee job attitudes regarding job satisfaction amongst employees working as doctors in government hospitals in Pakistan. Exploratory factor analysis with SPSS 15.0 for Windows extracted the factors such as employee justice perception, employee views regarding employers’ decision-making prejudice, equal opportunities for employees, decision-making concerns, grievance management, and management attitudes for procedural justice variables. In order to further examine this variable, confirmatory factory analysis was carried out and confirmed the same factors loaded on the procedural justice variable. This result verified that, for employees working as healthcare professionals in public organisations, the perception of fair procedures is linked to their job attitudes such as job satisfaction. The findings were measured for the organisational justice variable such as the perception of procedural justice relative influence to predict employee motivation for job satisfaction by applying β coefficient. The outcome reveals positive and significant prediction strength of procedural justice variable to employee job satisfaction. The beta coefficient of procedural justice ($\beta = .141$, $p<0.05$, $t_{projust}=2.41$) highlights the positive and significant input to employee job satisfaction. This finding concludes that, in public healthcare organisations, employees develop their attitude and work motivations on the basis of fairness in the procedures that address the concerns of employees and the affairs of the organisation. A perception of procedural justice greatly influences employee job satisfaction in public organisations (Alexander et al., 1987). Prior studies in the domain of organisational justice and organisational studies have examined the impact of procedural justice on employee motivational levels such as job satisfaction (Lambert et al., 2007; Dailey & Kirk, 1992; Huo et al., 1996) and found a significant and positive relationship. The findings of the current
study support H1 (employee perception of procedural justice is positively and significantly correlated to employee job satisfaction) and highlight the importance and need for fairness in procedures to enhance motivational levels of employees working in public organisations in general and specifically, healthcare professionals. In addition, this provides empirical evidence regarding the perception of the procedural justice relationship with employee job satisfaction. Furthermore, this empirical evidence extends and expands the current knowledge of employee job satisfaction attitude in Pakistan (Malik et al., 2010; Sheikh & Hatcher, 2004).

The second predictive variable of the study, employee job training in organisational work characteristics scale, has envisaged a slightly greater impact on employee job satisfaction attitude. A beta coefficient of job training ($\beta=.149$, $p<0.05$, $t_{\text{training}}=2.43$) signifies a positive correlation to employee job satisfaction for the employee working in public organisations. The study’s finding empirically prove that employees’ job training positively contributes to the job satisfaction of those employees working as public healthcare professionals, e.g., medical practitioners. The outcome of the study signifies the role of job training in the context of healthcare professionals to predict employee job satisfaction (Haq, 2008). The results of the study conform to the previous literature in which the impact of job training was examined to predict employee job satisfaction (Georgellis & Lange, 2007; Shields & Wheatley, 2007; Schmidt, 2007) and found a positive significant relationship. This study supported H2 (employee job training satisfaction is positively and significantly correlated to employee job satisfaction) and offered the empirical verification that employee job training contributes to employee job satisfaction. The results of this study also extend the boundaries of the knowledge in relation to employee job attitude in Pakistan (Haq, 2008; Siddiqui, 2003).

According to Muller et al. (1996), working conditions may have a regular impact on employee emotions and an employee may express positive or negative emotions in relation to his job. In fluid economic situations and development scenarios coupled with the fragile law and order in Pakistan (Janjua, 2009), it may be claimed that, on the basis of better working conditions in public healthcare organisations, employee motivation and job attitude such as job satisfaction can be increased. Improved working conditions such as safety and security arrangements for employees, provision of enough time to complete job tasks, availability of sufficient physical space to perform a job and convenient location of a job characterise the working conditions analysed in this study. This study found the effect of working conditions
to employee job satisfaction to be significant and positive. Analysis examined the working conditions variable with standard coefficient ($\beta$). A beta coefficient of variable working conditions ($\beta=.116, p<0.01, t_{workcond}=2.631$), signifying a positive input of working conditions influence to employee job satisfaction for healthcare professionals working in Pakistan in government hospitals. The data analysis for this study identifies that, amongst organisational work attributes, the work conditions variable can fairly influence employee motivation for employee job satisfaction; this construct contributed to predicting employee job satisfaction for healthcare professionals in public organisations (H3 accepted). As discovered in the data analysis, there was a positive correlation between employee job satisfaction and working conditions prevailing in organisations. Hence, H3 (working conditions are significantly correlated to employee job satisfaction) was confirmed.

Working conditions characterise the level of comfort that an employee experiences in a workplace (Abu-Bader, 2000). Kinz et al. in their study of a sample of healthcare professionals report that work conditions strongly influence employee job satisfaction. The environment in which one works has an incredible impact on the level of pride with which one performs. Attributes of working conditions such as the level of control over work and time pressure to finish assignments demonstrate a strong effect on healthcare professionals’ job satisfaction (Lederer et al., 2005). Kloep et al. (1994) identify poor working conditions as insufficient furniture, broken windows, paucity of papers and stationery, absence of work-related equipment, and transport problems when travelling to the work place. They further empirically found a link between control over work and the freedom to perform a job featuring working conditions to employee job satisfaction. The findings of this identify that employees of public healthcare organisations develop their behaviour and motivation for job satisfaction on the basis of working conditions in organisations. A similar outcome is supported by the literature in previous organisation studies (Yasuharu et al., 2007; Lederer et al., 2006; Kloep, 2004; Kinzl et al., 2005). This study not only maintains the preceding literature but has also extended the boundaries of knowledge in the domain of organisation studies by examining the working conditions predictor to assess employee job attitude to express job satisfaction in healthcare organisations in Pakistan.

The fourth predictive variable in the work characteristics scale to employee job satisfaction, the team spirit construct had a very strong impact on employee job satisfaction. Team spirit exists within an organisation and indicates the level of concern displayed by employees for each other’s problems (Jaworski et al., 1993). Team spirit emanates from a team that consists
of a group of people who are collectively interdependent on each other’s work in order to fulfil a common goal which acts as a binding factor among them (Boyet et al., 2005). Formation of team spirit in any organisation is based on enthusiastically shared feelings, beliefs and values in relation to group membership (Boyet et al., 2001). The construct team spirit identified the most important and relatively higher contribution in the work characteristics scale to the employee job satisfaction ($\beta=.261$, $p<0.01$, $t_{teamspirit}=4.625$) and supports hypothesis H4 of the study. H4 (team spirit is positively and significantly correlated to employee job satisfaction) is supported empirically and provides validation to the influence of team spirit on employee job attitude such as employee job satisfaction. The present findings recognised that, in the case of doctors working in public hospitals, job satisfaction is affected by team spirit. The results of this study regarding the link between team spirit and employee job satisfaction is consistent with previous findings examining employee job attitudes (Boyet et al., 2005; Meeral et al., 2009; Ellickson, 2001). A beta coefficient reveals a positive share to the endogenous (dependent) variable and the results demonstrate that employees of healthcare organisations stress the need for team spirit in an organisation in relation to their job attitude such as job satisfaction. It can be argued that, on the basis of team spirit and enthusiastically shared feelings, employee motivation can be enhanced and this will positively impact on job satisfaction. James & James (1992) and Ellickson et al. (2001) suggest that interpersonal affiliation among employees may lead to the formation of unique group dynamics that in turn impinge on productivity in organisation and employee job satisfaction. This also substantiates the claim that social relations in organisations can have a positive impact on job satisfaction. This study supports the earlier studies and contributes by analysing the team spirit predictor variable to assess the job attitudes such as job satisfaction of public employees working as medical healthcare professionals in healthcare organisations in Pakistan.

In organisations a lack of clear information about job tasks results in role ambiguity that may have an undesirable impact on employee job satisfaction (Kroposki et al., 1991). Job clarity and information given to the employee to perform the required job may elicit a number of favourable consequences such as employee job satisfaction (Donnelly, 1975). It might be argued that organisations where employees benefit from precise and clear information about their job may perform well and express a higher degree of satisfaction with their job (Kelly et al., 1980). In organisational studies literature, the job clarity predictor was applied to examine employee job attitude and motivation such as job satisfaction (Kim, 2009; Reid et al., 2008;
Ting, 1996) and found a significant positive contribution to employee satisfaction level. Studies suggest that job clarity and employee job satisfaction are two of the job characteristics predictors that help to lower commitment and turn over intention among employees and also restrain the role of job ambiguity (Kim, 2009; Bostrom, 1980). In this study the researcher applied four items adopted from Rainey (1983) and the results for impact of job clarity to predict employee job satisfaction was substantiated through a beta coefficient.

The assessment of path estimates and t-values for the relationship and beta coefficient ($\beta=.057$, $p<0.05$, $t_{\text{clarity}}=1.548$) was not proved to be significantly correlated to an endogenous variable of the study. Therefore, the hypothesis of the study H5, (employee job clarity is positively and significantly correlated to employee job satisfaction for employee job motivation), was rejected. Many studies support the positive and significant relationship between job clarity and employee satisfaction with the job (Zeffane et al., 2008; Jansen et al., 1996; Reid et al., 2008). However, in this study, the analysis identified that the job clarity construct did not significantly impact on developing employee job attitude and motivation in public hospital professionals such as general physicians in Pakistan. This finding is identical moderately to the information technology professionals sample from state government employees in the USA. The USA state government female IT employee sample reported an insignificant correlation of job clarity to their job satisfaction level (Kim, 2009).

In conclusion, the data analysis observations with the support of hypothesis testing propose that, for healthcare professionals such as medical practitioners working in public hospitals in Pakistan, job satisfaction can be influenced by organisational work attributes (Kinzl et al., 2005). This study supports empirically that employee job attitude and motivational level such as job satisfaction can be improved by applying organisational attributes. Healthcare public organisations can dynamically apply fair procedural mechanisms, job training programmes, instil team spirit, and a positive work environment with the freedom to perform job assignments and consequently influence the employee personality for motivation to express higher pleasure from work. On the other hand, the healthcare professionals who were the participants in this study (general physicians) did indicate that employee job clarity perception did not predict employee job satisfaction.
7.5 Employee Personality Aspects: Predictor to Employee Job Motivation for Job Satisfaction

This study assesses the impact of employee personality aspects in relation to employee attitude, belief and behaviour to express job satisfaction. By and large, the employee personality aspects predictor of this study reported a significant impact on employee job attitude to articulate job satisfaction.

Each variable of personality such as employee self-efficacy belief, self-esteem, and neuroticism were found to be significantly correlated to public healthcare employee job satisfaction in Pakistan. This observation highlights that an employee’s level of perception that the employee is valued and taken seriously, an employee’s emotional stability to cope with undesirable scenarios, and efficacy beliefs predict significantly employee job attitude for job satisfaction. In this study the researcher applied employee personality aspects such as employee self-esteem, employee self-efficacy belief, and neuroticism (Joyce et al., 2003; Judge et al., 2005; Timothy et al., 2008) to predict employee attitude and motivation for job satisfaction from work. A number of research studies (Srivastava et al., 2010; Sharma et al., 2006; Caprara et al., 2006; Moore et al., 1997; Rosenberg et al., 1995) supported the individual personality traits to understand motivation for job satisfaction.

In this study personality aspects were applied as independent factors to assess the magnitude of employee attitude and behaviour for employee job satisfaction in public healthcare organisations in Pakistan. Using exploratory factor with SPSS 15.0 version for Windows, three factors i.e., employee self-efficacy belief, employee self-esteem, and neuroticism (emotional stability) were finally loaded onto their assigned construct. However, unfortunately in this study, the locus of control variable did not load and hence was dropped from the study at this stage. These necessities further examined the uni-dimensionality of the instrument. The uni-dimensionality assessment exercise of constructs applied within this study to provide information that various indicators of construct have internal consistency and are noticeably different from other measures (Steenkamp et al., 1991). To examine the single dimensionality, the internal consistency and confirmatory analysis tests were performed. Applying confirmatory factor analysis, the results confirmed the three factors i.e., employee self-efficacy belief, employee self-esteem and neuroticism for employee
psychological aspect construct. This verifies that in public organisations the employee personality aspect may predict employee attitude and behaviour for job satisfaction.

The effect of personality aspects were examined for the impact of three determinant variables, that is, employee self-efficacy belief, employee self-esteem, and neuroticism on employee job satisfaction by their standard coefficient ($\beta$=coefficient). The results highlight both the positive and negative prediction of these determinants to the dependent variable of employee job satisfaction. A beta coefficient of employee self-esteem ($\beta$=.157, $p<0.05$, $t$=2.525) reveals that the employee self-esteem predictor contributes positively and significantly to employee behaviour and attitude for employee job satisfaction. This result highlights the fact that, in healthcare organisations in Pakistan, employees develop their behaviour and attitudes to job satisfaction on the basis of their levels of self-esteem. In fact, in previous literature the employee self-esteem variable was examined to understand employee job attitude such as job satisfaction (Alavi et al., 2003; Moore et al., 1997; Gardner et al., 1998) and found positive results. Employee self-esteem refers to the appraisal that employees make regarding themselves (Firth et al., 2004). Studies suggest that low self-esteem brings exertions among employees such as maladaptive behaviour, and psychological imbalance (Silverstone, 1991; Water et al., 2002); whereas higher self-esteem levels among employees correlate to positive job attitude such as employee job satisfaction and motivation (Kohli, 1982). In this study the results of the analysis supports H6 (employee self-esteem is positively and significantly correlated to employee job satisfaction). Consistent with the hypothesis of the current study, employee self-esteem was validated by this study as linked to employee job satisfaction. The healthcare professionals’ (doctors) contact with others is an important part of the job. Therefore, traits such as self-esteem that characterise a person with high levels of self-esteem will view challenging jobs as an opportunity to better serve people and benefit from (Locke et al., 1996). The literature suggests that individuals with an elevated level of self-esteem maintain optimism in the face of failure, which increases the possibility of future success and links this trait to employee job satisfaction (Dodgson et al., 1998; Korman, 1970)

The results of the current study provide substantial empirical evidence that in public healthcare organisations employees develop their job satisfaction on the basis of fulfilment of their levels of self-esteem. It also emphasises the need to develop ways and means to assist the improvement of self-esteem among public healthcare professionals in Pakistan. In
addition, this result extends and expands the limits of organisational studies specifically in the context of Pakistan (Malik et al., 2010; Sheikh & Hatcher, 2007).

Employees with a strong belief in their ability and effectiveness may predict higher levels of motivation for job attitudes such as employee job satisfaction. It might be argued that employee strong self-efficacy belief indicates employee behavioural actions by influencing a range of activities, effort, and perseverance when in a state of adversity (Bandura, 1989). The employee personality component of self-efficacy belief is linked to employee and organisation on the grounds that this relationship affects employee motivation to express pleasure or displeasure for a job. In the conceptual model of this thesis, which was developed on the basis of the previous literature, the researcher built up a relationship of employee self-efficacy belief as an independent predictor of employee behaviour and attitude towards employee job satisfaction. In this study, a six-item consisting scale by Chen & Eden (2001) was adopted to examine the impact of the employee self-efficacy traits on public sector healthcare professionals’ job satisfaction. A beta coefficient score was evaluated to assess the magnitude of employee self-efficacy traits on employee job satisfaction variable.

A beta coefficient of employee self-efficacy belief ($\beta=.198$, $P<0.01$, $t_{efficacy}=2.64$) reveals that this trait of employee personality significantly and positively predicts employee job satisfaction. The empirical findings, with a (0.01) stringent significance level, shows the strong correlation of employee self-efficacy belief to predict employee job satisfaction. Hence the hypothesis of this study, H7, (employee self-efficacy belief is positively and significantly correlated to employee job satisfaction) was proved and supported empirically. On the basis of the empirical evidence it can be inferred that in public healthcare organisations in Pakistan, employee self-efficacy belief facilitates employees’ motivation to develop their behaviour and attitude for employee job satisfaction.

On the scale of employee personality aspects to determine job satisfaction, the neuroticism construct has negative predictive impact on the dependent employee job satisfaction variable. The neuroticism trait of personality depicts the individual emotional stability level. In other words, neuroticism or lower emotional stability reflects the individual propensity to be positive, secure, and steady (Judge & Bono, 2001).

A beta coefficient outcome of neuroticism (lower emotional stability) trait shows ($\beta=.161$, $P<0.01$, $t_{neurotic}=2.71$) it was significantly and negatively predicted to employee job satisfaction. In this study empirical analysis findings support H8 (neuroticism trait of
personality is negatively correlated to employee job satisfaction). This result substantiates the fact that employees who have lower emotional stability feel less confident, secure and express more displeasure and report less job satisfaction. The results highlight the fact the medical practitioners’ attitude and motivation for job satisfaction not only depends on external factors but also on their personality disposition as well (Srivastava, 2010; Judge, 2001) Moreover, this result extends and highlights another area to explore regarding public healthcare professionals working in Pakistan (Siddiqui et al., 2001; Sheikh, 2007).

7.6 Conclusion

In conclusion, this chapter has presented a full discussion of the results developed on the basis of statistical analysis. The discussion included information about the scale applied by the researcher in this study, scale refinement and hypothesis testing. One out of a total of eight developed hypotheses was not found to predict the employee job satisfaction variable. Teamwork, procedural justice, self-efficacy belief, and job training satisfaction were significantly found to predict employee job satisfaction. One employee personality aspect, locus of control, was also not found to predict the employee job satisfaction of public healthcare professionals in Pakistan. The objective of this study is to predict the impact of organisational characteristics (i.e., procedural justice, training, team spirit, working conditions, job clarity), and employee personality aspects (i.e., self-efficacy belief, self-esteem, neuroticism) on the dependent variable, which is employee motivation for job satisfaction.

These variables were examined from a motivational perspective in order to understand their impact on employee job attitudes such as job satisfaction. Overall outcome of the study recognised team work, fairness in procedures and employee personality disposition as significant determinants to predict employee job attitude and behaviour for job satisfaction. Interestingly two proposed constructs that is to say task significance and locus of control orientation were not significantly found to be linked with employee job satisfaction.
The study gathered data on the basis of a cross-sectional approach at one point in time. The researcher collected data for the study from public employees working as general physicians in different public hospitals in Pakistan. In this study the researcher, following broad rang of the literature review, developed the thesis hypotheses. These hypotheses are based on the relationship between independent predictors organisation work attributes, personality disposition and the dependent variable of the study. This study also managed to build up unique correlative model of job satisfaction. This model is exceptional in its formation by amalgamating the organisation work attributes and personality correlates concurrently . In the context of developing economies work setting no major study has examined the role of personality correlates and work attributes concurrently to determine job satisfaction. In conclusion, this chapter has presented discussion on the outcome of the scale, measurement scales refinement and hypotheses testing. All proposed hypotheses developed and incorporated in the framework were elaborated with preceding literature and established inferences for the potential research. The stream of factors employee by researcher in this study might be further explored and enriched by taking into account the individual attitudes and behaviours towards employee job satisfaction. One out of eight independent predictor variables was not positively and significantly related to determine employee job satisfaction. Locus of control aspect of personality disposition, job clarity perception, and task significance were identified not to develop individual job attitudes in public Health care institutions of Pakistan. Moreover, procedural justice, team work, on job training and personality predictor variables were recognised to be more related to job satisfaction level enhancement.

In the next chapter of this thesis, implications for policy will be reported. In addition, the research will present the limitations of this study and also recommend the future direction of research to increase the employee job satisfaction of public healthcare practitioners.
Proposed Research
Revised Model
Chapter Eight: Conclusions

This section provides information and conclusion regarding research problem namely, what impact does have organisational attributes to employee job satisfaction, what role personality disposition to employee job satisfaction, and what is the consequence of employee job satisfaction to organisation. In recent past Pakistan has introduced new national health policy and plan called health for all (HFA). This policy anticipates most effective and motivated healthcare force to provide healthcare access to vulnerable segment of society in Pakistan. Enhanced priority has been given to competition, technological advancement, efficiency, motivation and effective usage to limited resource allocation in public sector.

The extent of this thesis was to study the employee job attitude predictor for employee job satisfaction. Following the careful literature review and numerous theoretical viewpoints, an amalgamated theoretical framework was articulated. This frame was based on organisational work attributes and employee personality disposition. Besides that the theoretical framework, a set of hypotheses have also been set to examine the impact of various determinants of job satisfaction.

This study followed a positivist methodology phenomenon that involves a survey questionnaire application to gather quantitative data to examine the study hypotheses. The sample chosen for this study was from public sector healthcare organisations of Pakistan. The sample consists of 600 medical doctors working as general physicians in twenty districts of Pakistan in public sector hospitals across the country. Structural equation modelling technique was applied to measure the hypothesised relationships among the variables.

This chapter starts with the theoretical input of this thesis and then the practical implications for practice and policy are discussed. Onwards researcher supplied information regarding to the methodological and theoretical limitations of this study. In the final future research possibilities are suggested.
8.0 Theoretical Implications

After carrying out the careful review of contemporary literature of human resource management and organisation behaviour, the theoretical model of employee job satisfaction for this study was built up. This study was performed in Pakistan from the sample of public employees working as medical doctors in public sector hospitals. It was proposed that public employees develop their attitude and motivation for job satisfaction on the basis of organisational work attributes and employee personality disposition. In the theoretical framework of study, the correlation of organisational work attributes/characteristics impact on employee job attitude regarding job satisfaction and employee personality disposition influence on employee motivation for job satisfaction was examined.

This representation was conceived on the basis of preceding studies in literature (Boyt et al, 2005; Dailey et al, 1992; Warr et al, 1979; Ellickson et al, 2001; & Judge et al, 2001). The organisational work attributes besides the personality disposition this research work observed the relationship between procedural justice, job training, esprit de corps, working conditions, job clarity, employee self esteem, employee self efficacy belief, and neuroticism impact on employee motivation for job satisfaction. Despite the fact that many earlier motivation studies and job satisfaction theories (see chapter2) have explored the employee job satisfaction, however, few of them recognise the relationship between organisational work characteristics and employee job satisfaction as well as employee disposition impact to job satisfaction. As this study conceptualised this relationship, it worth mentioning for healthcare policy making agencies in Pakistan to apply the outcome of this study to categorize areas in need for further improvement.

Statistical analysis identified that all proposed hypotheses of study except one were accepted. Over all organisation work attribute were found to be significantly and positively correlated to measure employee job attitude and behaviour for employee job satisfaction. The predictive of strength of work attributes to examine employee job satisfaction were found to be noteworthy, however, one predictor employee job clarity perception in organisation was not found be significant predictor to measure employee job behaviour and attitude for employee job satisfaction.
In addition, two employee personality aspect such that employee self efficacy belief, and employee self esteem were also found to be significant and positive predictors of employee job satisfaction. However, the neuroticism variable of employee personality aspect was found to be significantly and negatively correlated to predict employee job satisfaction. The empirical findings generated from this study not only support the development of employee motivation and attitude for job satisfaction particularly health care professionals in Pakistan but also reduce the void regarding job satisfaction studies in Pakistan. This study attempted to present an insight to medical practitioners’ job satisfaction in Pakistan particularly and in the domain of employee job satisfaction generally.

This study is based on the development of extensive and systematic theoretical framework that observes the antecedents/predictors which effect employee motivation and job attitude in health care organisations in Pakistan. The development of this frame work characterise the novelty of this study and very few studies have examined the relationship of work attributes and employee personality disposition in a way as this relationship has been conceptualised in this thesis by researcher. Preceding empirical works which have been done in the domain of employee job satisfaction did not concentrate on the organisational work attributes and employee disposition to evaluate the employee motivation and attitude for job satisfaction. Therefore, it can be maintained that this frame work is unique in its characteristics for theoretical and empirical assessment .Numerous theoretical input generated from this research study.

This study is original to the best of the understanding of researcher to apply the empirical findings which synthesised the premise from the theories of  Herzberg two factor theory, Maslow’s hierarchy needs theory, and Adams theory of equity to examine employee behaviour and motivation for job attitude in the more integrated form , in the perspective of Pakistan.
Following are the some of the key contributions of this study specifically:

- Unique causal and correlative model that concurrently examine the work attributes and personality disposition to determine employee job satisfaction

- Supplied input and knowledge in the domain of job satisfaction from developing countries prospect i.e. Pakistan

- One of few studies in the context of developing countries health care professionals

- Extended the boundaries of knowledge from relatively new context

- Attempted to minimise the paucity of healthcare professionals’ job attitude studies

- Presented substantial input to healthcare managers and policy makers

- Recognized the need of job satisfaction as major source of quality healthcare services

- Emphasize the need of better working conditions and job training for motivation

- Acknowledge the value of work attributes and personality disposition to determine job satisfaction
Implications

Theoretical
- Distinctive causal model which explore employee personality disposition and work attributes to determine employee job satisfaction
- Provided important empirical knowledge in the Domain of job satisfaction and job attitude
- Contributed to the knowledge in the domain Of job satisfaction from the developing countries perspective
- Supplied abundant input to the scarce knowledge from Pakistan how to motivate and develop job satisfaction
- Key predictors of organisation work attributes and personality disposition are amalgamated in unique formation
- Supplied and added knowledge to the public health Care professionals’ job satisfaction
- Supplied empirical information from relatively new work context

Practical
- Supplied considerable able input to the development of human resource policies
- Identified the need of team work and justice to develop employee job satisfaction
- Identified for healthcare policy makers to recognise the need of job satisfaction as a main source of quality health service
- Recommended sufficient training chances to enhance job satisfaction level
- Suggested policy makers to provide better working conditions to healthcare employees
- Addressed the need of personality disposition to measure employ job satisfaction
- Supplied considerable able input to the development of human resource policies

Methodological
- Overall according to the findings of this study all scales applied in the study found to be valid in general
- Supplied refined version of several items applied in different scales of the study
- Validated the usefulness and generalisibility of the different scales applied in the study across the different work context

Novelty
Exceptional casual model which concurrently analyses the organisational work attributes and personality disposition to determine employee job satisfaction. Not any other study has examined the personality and work attributes in such a way.

Prospective Research Course of Action
As this research has examined direct relationship of organisational work attributes and employee psychology with dependent variable of employee job satisfaction, future studies may assess more complex employee job satisfaction correlative models.

Anticipated research work could also replicate studies on healthcare professionals’ job satisfaction and develop as well as adjust the current employee job satisfaction models to fit in other healthcare organisations in developing countries context.

Future research may utilise the job satisfaction model developed for this study in context of other than healthcare.

Prospective research may enhance the applicability of the outcome and consistency of this study instrument by increasing the sample size and may add other considerations of job satisfaction.

This study in addition also suggest for future research that along with survey instrument may follow interpretivist technique of interviews to draw more conclusive information.
This thesis developed a comprehensive correlative model which amalgamates the factor related to organisational work attributes and employee personality disposition. In addition, even though many studies have explored the domain of employee job satisfaction, few of those studies have examined the interrelationship between organisational work attributes and employee personality disposition in unique combination as this study has developed this relationship.

As researcher developed this relationship in current study, it is important for healthcare policy makers and health organisation managers to utilize the outcome of this empirical study to recognize areas in need of further progress.

Second contribution of this study is that, this study provided valuable empirical knowledge from Pakistan in the domain employee job attitude. Besides that study supplied to the scarce knowledge on how employees in public organisations in Pakistan develop their attitude and motivation for job satisfaction. In this observation, the researcher has examined the subjects which are those predictors that impact the employee behaviour and motivation in organisation to prop up job satisfaction. In this thesis researcher has amalgamated a set of key predictors such as Procedural justice, Job training, Esprit de Corps (Team work), Working conditions, Job clarity, Employee self esteem, Employee self efficacy belief and Neuroticism in response to the employee reactions to organisation work setting and employee job satisfaction.

This research work was carried out in the context of public health care organisations in Pakistan which in itself an additional contribution to the knowledge that this study has provided valuable empirical unique data from health care public organisations first time in Pakistan. Moreover, the study provided to the literature on how employee of public health care organisation in Pakistan develop their motivation and job attitude for employee job satisfaction. On the basis of these contributions of this thesis it can be said that current study has accomplished to present insight into medical practitioners health care professionals job satisfaction in Pakistan, and thereby into the domain of organisation studies and Job satisfaction in general. This thesis has also filled the void in the field of job satisfaction in the context of Public health care employees in Pakistan and has opened the doors to the new opinions and studies. Nevertheless empirical literature has been found in the Municipal organisations employees, Social work organisation, banking sector, IT professionals and
school teachers (Ellickson et al., 2001; Abu Bader, 2000; Tanja et al., 2003; Trimizi, 2010; & Mcfarlin et al., 1992), the context of this study was health care organisations that are most important for extensive and wide range validity of findings.

In final an input addition and extension to the boundaries of knowledge relates to the fact that this study provides empirical information from relatively a different and new context, taking into account that most of earlier studies in this domain have been conducted in Europe and Canada and USA (Bukhari, 2008). This study is one of the few studies that reported on employee job attitude and motivation for job satisfaction in public organisation in Pakistan. This is considerable finding to test of a wider validity of empirical outcome generated from research work carried out in south Asian perspective.

8.1 Practical Implications

The analysis and assessment of the predictors that influence employee to get motivation for job satisfaction is a significant attainment. In the long run, Job satisfaction affects employee job attitude and behaviour that consequently reduce turnover rate, absenteeism and increase motivation. This study may have more than a few practical implications, nonetheless, some important practical for health care policy makers and managers are as followed.

Apart from the examined implications for the theory of employee job satisfaction, the current study has also significant input to Human Resource management policy and practice. The conceptual frame work and findings generated with the support of applicable statistical analyses reveal that administration policies regarding human resource should take into consideration the place where employee work and develop policies on that basis for employee motivation. The public health care professionals in Pakistan health organisations value more to team work (esprit de corps) and procedural fairness in their organisation, hence, the more recognised and typical are the employment attachments in place. This emphasis for the specific regulations, procedures, rights, and responsibilities that will make public health care employees more motivated and satisfied to work for their organisation. In Public organisations employees are tend to observe the formal rules and regulations which are communicated to them from day one of their job. The clearly defined procedures in public organisation may assist health care employees to follow the prescribed rules and perform
their duties according to rules and directives. This indebted responsibility signifies the employee job attitude and motivation toward organisation (Moorman et al, 1993).

Secondly this study highlights the fact that health care managers need to recognise that the health care professionals’ job satisfaction as major source of quality health service. Health care personnel views regarding their profession are detrimental source of their job attitude for job satisfaction, which consequently influence their job quality and quality service provided by them to patients. Therefore, it may be concluded that an enhanced level health care professional job satisfaction would lead to far better quality health care service in public health care organisations in Pakistan to improve life expectancy and quality life of community.

Thirdly, on job training opportunities provided to health care employees in public organisations can lead to developing employee attitude and behaviour for employee job satisfaction. Hence Health care policy makers need to introduce on job training programmes to meet the healthcare professionals training needs and equip them with latest advancement in their relevant field of knowledge. According to the opinion of this study participants ample provision of job training lead to enhance level of positive job attitude and motivation that ultimately turn into better service to patient care and effective use of resources in public healthcare organisations in Pakistan. Overall this outcome suggest that better and sufficient job training given to employees in the workplace may facilitate employee job attitude and behaviour to predict enhanced level of job satisfaction.

Fourthly, the finding of this study highlights the significance of working conditions to employee job attitude and motivation at workplace. This finding ascertain that enough physical space to perform job, pleasant working environment, ensured security and safety and access routes to workplace contribute to employee job satisfaction in health care public organisations of Pakistan. Thus this study proposes that healthcare organisations should create such working conditions that provide employees sense of security and freedom to work with their full freedom and vigour.

Fifth, the employee job attitude and behaviour to predict job satisfaction is not only dependent to organisational work attributes but also on individual employee personality aspects as well. The relationship between employee personality aspects and job satisfaction
found in current study may make available a further verification of the significance of personality traits in measuring and determining employee job satisfaction. Results established that in healthcare organisation of Pakistan employees personality disposition may need to be considering to determine their job attitude and motivation. The outcome of this study realises that Healthcare professionals (General Physicians) with specific personality inclination which are essential for that job may derive higher job satisfaction from the job. This also confirms that employee personality aspects are equally significant as organisational work attributes to predict employee satisfaction for the healthcare professionals working in public hospitals of Pakistan.

Finally, regarding job clarity, this study found less evidence in the perspective of healthcare professionals to predict job attitude and motivation. This might be due to fact that nature of job of general physicians of public sector hospitals of Pakistan is such that they need to examine and diagnose themselves regarding their patients and need not any directions from management regarding their job. However, policy makers of healthcare organisations are suggested to make policies which support clear job descriptions and reduce ambiguities in public healthcare organisation to enhance employee morale when come across with any challenging scenario.

Most significant implication of current thesis is that employees belonging to healthcare organisations of Pakistan may build up and determine positive attitudes and behaviours on the basis of organisational work attributes and personality disposition factors.

**8.2 Methodological Implications**

As far as methodological input of this study is concerned to the best of the researcher knowledge that this thesis is among few empirical studies that examine employee job satisfaction and its predictors outside the restricted orbit of western cultural setup, specifically in the context of south Asia in Pakistan. Literature on employee job satisfaction such as Judge et al. (1997) Adams et al. (2000); Bradley et al. (2003); Brunetto et al. (2005) ;Ann et al. (2008); Miller et al.(2009) and Mohr et al.(2010) examined the employee job attitude and morale variables in the developed and western cultural organisations and work settings. The current study anticipating this void has filled the gap in international
investigation by examining the employee satisfaction predictors in cross cultural work set up that may be beneficial for generalising and validation of these predictors in broader scope. Considering and determining the predictive variables of employee job satisfaction in Pakistan, could supply further overview into existing literature relevant to the culture and people of Pakistan. The people of Pakistan as well their culture are distinct and also public sector organisational setup is based on tall structures formed by many levels of hierarchy in Pakistan (Islam, 2004). The empirical evidence generated with the support of this study recommends that employee job attitude, morale, and behaviour are very vital in public organisations and can be developed in identical way not only in western context but also in non-western context. Employees of public sector in Pakistan share their identical feelings, likes, dislikes and beliefs regarding the employee job satisfaction to those reported in domain of job satisfaction. Additionally, the conceptual model developed for this study elaborate employee personality and work attributes and their impact for employee job attitude and motivation to predict employee job satisfaction. Apart from that, this study has substantiated the existing measurement scales of employee job satisfaction and its determinants in a country that is culturally distinct and unique from other work settings.

Overall according to the findings of this study all scales applied in the study found to be valid in general. However, the numbers of items in refined scales were not same as those of original scales. In this regard the analysis of employee job satisfaction scale that include of ten items was refined with six items and found higher reliability and construct validity. In the same way in organisational work attributes for employee job satisfaction scale one variable the employee task significance was not completely loaded. In employee personality aspects scale the one variable of locus of control was also not loaded on its assigned construct. Nonetheless, a few scales such as employee Eprit de corps, and job training were refined on their fundamental items while few items were exempted from the Procedural justice, working conditions, job clarity, Employee self efficacy belief, self esteem and Neuroticism scales and loaded with derived items and presented high reliability and construct validity. Prospective cross sectional research may draw potential support from this study for additional examination about the basic requirements in which evaluation of scales across countries might be affected.
8.3 Limitations of the study

As like any other research projects, this study has quite a few limitations. The subsequent section supplies information regarding the limitations identified by the measurement issues, research design, and research setting.

- Limited to the only healthcare professionals’ (General physicians) job satisfaction
- Possibility of further examination out of purview of healthcare organisations to substantiate the generalisability
- Indifferent attitude of individuals and lack of cooperation from the selected sample
- Lack of awareness in developing countries regarding the importance of research
- Mono-source instrument to obtain data at one time only
- Data obtained limited only to twenty districts level public healthcare hospitals
- Applied cross sectional method to gather data at single point of time
- Limited only to determine the job satisfaction of one group of healthcare professionals.

8.3.1 Theoretical Limitations

In spite of generating potential outcome, like any other study, this study as well has some limitations that upcoming research needs to address and accommodate. This study provides input to the field of human resources management by assessing the employee job satisfaction predictors only in the context of healthcare sector which may cap the generalisability of the findings. There is significant chance and likelihood that individuals who are employed in non healthcare professions may have comparatively different job attitude and behaviour to predict employee job satisfaction. As a result, the antecedents of employee job satisfaction identified in this framework should be examined in other organisation out of the purview of healthcare organisations in context of Pakistan and to ascertain the impact of said factors in those setups.
and institutions. Hence, further examination and evaluation is imperative to substantiate its generalisability.

Secondly, it is very tiresome to conduct research in developing country like Pakistan and have genuine set of data. In Pakistan higher educational institutions and research & development organisations are paying more attention to this issue, however, individuals’ attitude and cooperation for research activities still in transition stage. In process of this thesis development researcher come across obstacles, such that the lack of awareness of the significance of research, shortage of data base and paucity of study context related electronic resources.

Third deficiency of current thesis is application of mono – source instrument. This might inflate some of the relationships between variables but cannot be accountable for discovering links. This limitation is reported in all field studies applying self reported instrument and it is hardly possible to envisage a way-out other than self reported questionnaire to measure employee job attitude such as job satisfaction. However, the research instrument adopted for this thesis has well established psychometric standing and resistant to any bias or discrepancy (Spector, 1987).

Furthermore, with regard to the sample size, although sizable number of findings in this study has been consistent with the prior studies, it is important be watchful in inferring the result because the outcome is limited to only twenty to Districts public sector hospitals in Pakistan.

8.3.2 Methodology Limitations

As like any other quantitative research design based study this study also has specific methodological deficiencies. This study has not examined employee job attitude and behaviour to predict job satisfaction over period of time that needs to taken into account while presenting the results.
This study data is dependent on application of mono-source self reported questionnaire that might generate common method bias and might produce spurious relationships (Cole et al, 2006).

Second limitation of this study pertains to its design which is cross sectional. This study applied cross sectional approach to accumulate the data at single point of time and that might not able to inculcate the cause and effect linkage among the variables of this study. Imminent researches that apply longitudinal design to determine employee job satisfaction factors probably be stronger. In the field of Human resources management and organisation studies suggest that employee disposition and organisational environment are transforming due to technological advancement and support the longitudinal analysis. The analysis over period of time by applying longitudinal approach may be predominantly helpful to study the employee attitude and behaviour to determine employee job satisfaction.

Third, this study was conducted from the sample of public sector employees belonging to healthcare sector employees only which reduces the generalisability of the research findings (Lance et al, 1997; Khowaja et al, 2005). Additionally, this empirical study was carried out in Pakistan; as a result it has limited scope of the result findings from generality point of view to be applied in developed or western context.

Fourthly, in this study participants are taken up on voluntarily basis and have freedom to fill up the survey instrument wherever, they wish to do so such that at their place of work or at home. This probably could have impacted and respondents probably have been influenced by the effect of environment and similar other factors while providing the input for survey instrument.

Fifth this study applied the survey questionnaire method to gather the data and which has limitation. The survey might cause common method bias and data gathered from a mono source might be distracting from causal prediction point of view since the study applied questionnaire and measures are taken up for only single time(Wright et al, 2007; Avolio et al, 1991). It is recommended that use of more than one method may be supportive to more clarify the purposed predictors of employee job satisfaction. This deficiency of this study
suggest that along with quantitative technique based survey instrument, in detail interviews with participants would be help to address the employee job satisfaction issue more profoundly.

8.4 Prospective Research Course of Action

The outcome of this study mainly supplies input to the theory and practice of human resource management, organisational psychology, organisational behaviour and job satisfaction. This empirical study provides in detail acquaintance of employee job attitude and behaviour by assessing the organisational work attributes and employee psychological factors to determine and evolve strategies which contribute to enhance employee job satisfaction.

Despite the fact that this study identifies numerous aspect that are relevant to employee job satisfaction of public sector employees in Pakistan. Still at great length much need to be explored in the domain of public sector employees’ job satisfaction as well as healthcare professional in Pakistan.

There are numerous opportunities for future research. As this research has examined direct relationship of organisational work attributes and employee psychology with dependent variable of employee job satisfaction, Future studies may assess more complex employee job satisfaction correlative models.

Anticipated research work could also replicate studies on healthcare professionals’ job satisfaction and develop as well as adjust the current employee job satisfaction models to fit in other healthcare organisations in developing countries context. It will also be very worthwhile to have comparative studies to evaluate the public and private sector healthcare employees’ job satisfaction.

Since the employee job attitude and behaviour not only enhance employee motivation but also impact of organisation effectiveness. Future research may utilise the job satisfaction model developed for this study in context of other than healthcare. There is huge possibility that employees seeking employment in other sectors may have different perception regarding jobs and workplace. Consequently, the proposed predictors of employee job satisfaction should be examined in numerous other organisations in identical work culture settings to strengthen the generalisability.
Prospective research may enhance the applicability of the outcome and consistency of this study instrument by increasing the sample size and may add other considerations of job satisfaction such as organisational politics, leader employee relationships, usage of information technology in public organisations and participatory management style.

This study in addition also suggest for future research that along with survey instrument may follow interpretivist technique of interviews to draw more conclusive information about individual employees’ job attitude and behaviour for employee job satisfaction.

Finally it is recommended that several other organisational aspects coupled with organisational work attributes and employee psychology might be added to examine job satisfaction in depth for future research. Extensive sample including diverse professionals across public sector may supply more diverse and strong findings and support future research. Hence, more and more studies are required to fully examine and understand the employee job attitude and behaviour to predict job satisfaction in the domain of public organisations.
Computer screen generated Graphic View
Computer screen generated Graphic View
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### Appendix A

#### Univariate Statistics

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<td>310</td>
<td>.6516</td>
<td>.47723</td>
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<td>.0</td>
<td>0</td>
</tr>
<tr>
<td>Age</td>
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<tr>
<td>Tenure</td>
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<td>2.8903</td>
<td>1.22840</td>
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<tr>
<td>Qualification</td>
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<td>1.2710</td>
<td>.58359</td>
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<tr>
<td>Marital Status</td>
<td>310</td>
<td>1.3516</td>
<td>.54765</td>
<td>0</td>
<td>.0</td>
<td>0</td>
</tr>
</tbody>
</table>

a Number of cases outside the range (Q1 - 1.5*IQR, Q3 + 1.5*IQR)
This survey Questioner is part of the PhD research. The purpose of this survey is to assess public employees’ level of job satisfaction toward different aspects of their jobs. The public employees chosen for this study are General Physicians (GP’s) working at public hospitals in Pakistan. This survey Questioner consists of four parts. First part is about personal information of participants. Second part is related to participants’ views toward overall job satisfaction they derive from their jobs. Third part attempts to seek opinion of individuals toward various organisational characteristics. Finally in part four individuals’ personality variable information is sought.

- Your participation in this Questioner survey is voluntarily
- Information provided by you kept strictly confidential under data protection act of Brunel Business School, Brunel University London, United Kingdom.

### Part-A

**Personal Profile**

Tick the appropriate one ( √)

<table>
<thead>
<tr>
<th>1. GENDER</th>
<th>FEMALE</th>
<th>MALE</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>1. AGE</td>
<td></td>
</tr>
<tr>
<td>18-25</td>
<td>26-40</td>
<td>41-50</td>
</tr>
<tr>
<td>51-60</td>
<td>60 and Above</td>
<td></td>
</tr>
<tr>
<td>3. LENGTH OF SERVICE</td>
<td>&lt; 1 Year</td>
<td>1-5 Years</td>
</tr>
<tr>
<td>4. ACADEMIC QUALIFICATION</td>
<td>Bachelor in medicine &amp; surgery (MBBS)</td>
<td>Master’s Degree</td>
</tr>
<tr>
<td>5. MARITAL STATUS</td>
<td>Married</td>
<td>Single</td>
</tr>
</tbody>
</table>
Part-B

Section: 1  Over all Job satisfaction

<table>
<thead>
<tr>
<th></th>
<th>Please circle the response for each question that comes closest to reflecting your opinion</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Are you satisfied with the recognition or respect that you get for your good work?</td>
</tr>
<tr>
<td>2</td>
<td>How much satisfied or dissatisfied are you with the treatment of your immediate boss to you?</td>
</tr>
<tr>
<td>3</td>
<td>How will you scale the rate of pay you are getting in current job as health professional?</td>
</tr>
<tr>
<td>4</td>
<td>Are you satisfied with the amount of responsibilities assigned to you in your current job?</td>
</tr>
<tr>
<td>5</td>
<td>How satisfied are you with the opportunities to use your abilities in your present job?</td>
</tr>
<tr>
<td>6</td>
<td>Are you satisfied the way health administration is dealing with the affairs of hospitals?</td>
</tr>
<tr>
<td>7</td>
<td>Are you satisfied with the level of attention paid to your valuable suggestion to improve the affairs of management at your current job?</td>
</tr>
<tr>
<td>8</td>
<td>How would you rate the schedule (i.e. 9.00 - 5.00) of Hours of work in your organisation?</td>
</tr>
<tr>
<td>9</td>
<td>How much are you satisfied with future chances of promotion in your this job?</td>
</tr>
</tbody>
</table>

1=strongly disagree, 2=disagree, 3=somewhat disagree, 4=undecided, 5=Somewhat agree, 6=Agree, 7=Strongly agree
### Part-C

#### Section:1 Procedural justice: Satisfaction with fairness of procedures

**Please** circle the response for each that comes closest to reflecting your opinion

Disagree Very much = DVM, Disagree Moderately = DM, Disagree Slightly = DS, I am not sure = IMNS, Agree slightly = AS, Agree Moderately = AM, Agree very much = AVM

<table>
<thead>
<tr>
<th></th>
<th></th>
<th>DVM</th>
<th>DM</th>
<th>DS</th>
<th>IMNS</th>
<th>AS</th>
<th>AM</th>
<th>AVM</th>
</tr>
</thead>
<tbody>
<tr>
<td>10</td>
<td>Your manager at work place makes job decision without any prejudice and biasness</td>
<td>DVM</td>
<td>DM</td>
<td>DS</td>
<td>IMNS</td>
<td>AS</td>
<td>AM</td>
<td>AVM</td>
</tr>
<tr>
<td>11</td>
<td>Your manager gives equal opportunity to all his employees to express their concern before making job decision</td>
<td>DVM</td>
<td>DM</td>
<td>DS</td>
<td>IMNS</td>
<td>AS</td>
<td>AM</td>
<td>AVM</td>
</tr>
<tr>
<td>12</td>
<td>Your job manager collects complete and accurate information before making job decisions</td>
<td>DVM</td>
<td>DM</td>
<td>DS</td>
<td>IMNS</td>
<td>AS</td>
<td>AM</td>
<td>AVM</td>
</tr>
<tr>
<td>13</td>
<td>He treats you with kindness and due considerations when it comes to make decision about your job/work</td>
<td>DVM</td>
<td>DM</td>
<td>DS</td>
<td>IMNS</td>
<td>AS</td>
<td>AM</td>
<td>AVM</td>
</tr>
<tr>
<td>14</td>
<td>He is sensitive to your personal need when it comes to make job decisions</td>
<td>DVM</td>
<td>DM</td>
<td>DS</td>
<td>IMNS</td>
<td>AS</td>
<td>AM</td>
<td>AVM</td>
</tr>
<tr>
<td>15</td>
<td>Your Boss treats you with respect when comes to make decision about your job</td>
<td>DVM</td>
<td>DM</td>
<td>DS</td>
<td>IMNS</td>
<td>AS</td>
<td>AM</td>
<td>AVM</td>
</tr>
</tbody>
</table>

#### Section:2 Satisfaction with working conditions

**Please** circle the response for each that comes closest to reflecting your opinion

Disagree Very much = DVM, Disagree Moderately = DM, Disagree Slightly = DS, I am not sure = IMNS, Agree slightly = AS, Agree Moderately = AM, Agree very much = AVM

<table>
<thead>
<tr>
<th></th>
<th></th>
<th>DVM</th>
<th>DM</th>
<th>DS</th>
<th>IMNS</th>
<th>AS</th>
<th>AM</th>
<th>AVM</th>
</tr>
</thead>
<tbody>
<tr>
<td>16</td>
<td>Your work place authorities take all precautions to make work place safe and secure to work</td>
<td>DVM</td>
<td>DM</td>
<td>DS</td>
<td>IMNS</td>
<td>AS</td>
<td>AM</td>
<td>AVM</td>
</tr>
<tr>
<td>17</td>
<td>You have enough time at your disposal to finish assignments</td>
<td>DVM</td>
<td>DM</td>
<td>DS</td>
<td>IMNS</td>
<td>AS</td>
<td>AM</td>
<td>AVM</td>
</tr>
<tr>
<td>18</td>
<td>You have enough physical space to do your job well</td>
<td>DVM</td>
<td>DM</td>
<td>DS</td>
<td>IMNS</td>
<td>AS</td>
<td>AM</td>
<td>AVM</td>
</tr>
<tr>
<td>19</td>
<td>Travel to and from work place is convenient.</td>
<td>DVM</td>
<td>DM</td>
<td>DS</td>
<td>IMNS</td>
<td>AS</td>
<td>AM</td>
<td>AVM</td>
</tr>
<tr>
<td>20</td>
<td>The physical surroundings of work place are pleasant</td>
<td>DVM</td>
<td>DM</td>
<td>DS</td>
<td>IMNS</td>
<td>AS</td>
<td>AM</td>
<td>AVM</td>
</tr>
<tr>
<td>21</td>
<td>The environment at your work place is such that you can forget about personal problems</td>
<td>DVM</td>
<td>DM</td>
<td>DS</td>
<td>IMNS</td>
<td>AS</td>
<td>AM</td>
<td>AVM</td>
</tr>
<tr>
<td>22</td>
<td>The environment at work place is such that you are not asked of excessive amount of work</td>
<td>DVM</td>
<td>DM</td>
<td>DS</td>
<td>IMNS</td>
<td>AS</td>
<td>AM</td>
<td>AVM</td>
</tr>
</tbody>
</table>
### Section: 3 On Job Training Satisfaction

<table>
<thead>
<tr>
<th>Question</th>
<th>DVM</th>
<th>DM</th>
<th>DS</th>
<th>IMNS</th>
<th>AS</th>
<th>AM</th>
<th>AVM</th>
</tr>
</thead>
<tbody>
<tr>
<td>Do you get the training you need to perform your job well?</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Over all on job training you receive is applicable to your job</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>You are generally able to use what you learn in on job training in your job</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Are you extremely interested in seeking ways to improve what you do?</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Are you agreeing that the training and learning opportunities provided to you meet the level of changing needs of your work?</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

### Section: 4 Task significance/ value (chance to influence the welfare of others)

<table>
<thead>
<tr>
<th>Question</th>
<th>DVM</th>
<th>DM</th>
<th>DS</th>
<th>IMNS</th>
<th>AS</th>
<th>AM</th>
<th>AVM</th>
</tr>
</thead>
<tbody>
<tr>
<td>Your job has a great impact on the people outside the organisation</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Work performed on your job has as well significant impact on the people outside your organisation</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>The results of you work are likely to affect the lives of other people</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Your job is very important and significant in the broader scheme of things</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Section: 5 Satisfaction with feelings proud of organization
(ESPRIT DE CORPS)

Please circle the response for each question that comes closest to reflecting your opinion
Disagree Very Strongly=DVS, Disagree=DS, Somewhat Disagree=SWD, I Am Not Sure=IMNS, Somewhat Agree=SWA, Agree=AG, Agree Very Strongly=AVS

<table>
<thead>
<tr>
<th></th>
<th>People in organisation you work with are genuinely concerned about the needs and problems of each other?</th>
</tr>
</thead>
<tbody>
<tr>
<td>35</td>
<td>DVS</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th></th>
<th>How much you agree with this statement that all staff members in your organisational unit are emotionally attached with each other?</th>
</tr>
</thead>
<tbody>
<tr>
<td>36</td>
<td>DVS</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th></th>
<th>How will you rate that team work spirit prevail in all ranks of your organisation?</th>
</tr>
</thead>
<tbody>
<tr>
<td>37</td>
<td>DVS</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th></th>
<th>How much do you side with the notion that working in your organisation is like part of big family?</th>
</tr>
</thead>
<tbody>
<tr>
<td>38</td>
<td>DVS</td>
</tr>
</tbody>
</table>

Section: 6 Job clarity

Please indicate your agreement or disagreement with following.
Strongly disagree=1, Disagree somewhat=2, Disagree a little=3, Neither agree nor disagree=4, Agree a little=5, Agree somewhat=6, Strongly agree=7

<table>
<thead>
<tr>
<th></th>
<th>How much will you agree or disagree that goals of organisation you work with are clearly defined to you?</th>
</tr>
</thead>
<tbody>
<tr>
<td>39</td>
<td>1</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th></th>
<th>Is it easy for you to give precise explanation of goals of organisation you work with?</th>
</tr>
</thead>
<tbody>
<tr>
<td>40</td>
<td>1</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th></th>
<th>The performance goals of your job are clear and specific</th>
</tr>
</thead>
<tbody>
<tr>
<td>41</td>
<td>1</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th></th>
<th>The standards and gaols which have been set for your job are challenging and difficult</th>
</tr>
</thead>
<tbody>
<tr>
<td>42</td>
<td>1</td>
</tr>
</tbody>
</table>
### Part-D

#### Section: 1  Locus of Control

Please indicate your agreement or disagreement with following statements

**Strongly disagree=1, Disagree somewhat=2, Disagree a little=3, Neither agree nor disagree=4, Agree a little=5, Agree somewhat=6, Strongly agree=7**

<table>
<thead>
<tr>
<th>Q</th>
<th>Statement</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
</tr>
</thead>
<tbody>
<tr>
<td>43</td>
<td>Are you of opinion that your life is control by accidental happenings?</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>44</td>
<td>Do you have feeling that what happens in your life is mostly determined by powerful people?</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>45</td>
<td>When you make plan s. You are certain to make it work</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>46</td>
<td>How much you agree or disagree with When it comes to what you get what you want? It is mainly because you are lucky person?</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>47</td>
<td>You often believe that your life is chiefly controlled by powerful others?</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>48</td>
<td>Are you kind of individual who can pretty much determine what happens in his/her life?</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>49</td>
<td>To which extent you are agree or disagree with the opinion that what you achieve in your life is because of your hard work?</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>50</td>
<td>Do you agree that your life is determined by your own actions</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

#### Section: 2  Self esteem (value one place on him/herself)

Please indicate your agreement or disagreement with following statements

**Strongly disagree=1, Disagree somewhat=2, Disagree a little=3, Neither agree nor disagree=4, Agree a little=5, Agree somewhat=6, Strongly agree=7**

<table>
<thead>
<tr>
<th>Q</th>
<th>Statement</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
</tr>
</thead>
<tbody>
<tr>
<td>51</td>
<td>You feel you have number of good qualities</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>52</td>
<td>On the whole you are satisfied with yourself.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>53</td>
<td>You are able to do things well like most other people</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>54</td>
<td>You certainly feel useless of yourself at times</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>55</td>
<td>You take positive attitude toward yourself</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>56</td>
<td>At a time you think you are not good at all</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>57</td>
<td>You wish you could have more respect for yourself</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>58</td>
<td>All in all you are inclined to think that you are a failure</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
### Section: 3  Self Efficacy (One’s basic strength to deal with life demands)

Please indicate your agreement or disagreement with following statements

**Strongly disagree=1, Disagree somewhat=2, Disagree a little=3, Neither agree nor disagree=4, Agree a little=5, Agree somewhat=6, Strongly agree=7**

<table>
<thead>
<tr>
<th></th>
<th>Statement</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
</tr>
</thead>
<tbody>
<tr>
<td>59</td>
<td>“As individual” When facing difficult responsibility, you are sure that you will be able to do that.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>60</td>
<td>“As individual” You believe you can succeed at most any aim to which you set your mind</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>61</td>
<td>“As individual” You will be able to achieve most of the goals which you set for yourself</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>62</td>
<td>“As individual” You are confident that you can perform effectively on many tasks</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>63</td>
<td>“As individual” Compared to other people, You can do most tasks better</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>64</td>
<td>“As individual” You can perform fairly well even when things are tough.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
</tbody>
</table>

### Section: 4  Neuroticism (Level emotional stability)

Please indicate your agreement or disagreement with following statements

**Strongly disagree=1, Disagree somewhat=2, Disagree a little=3, Neither agree nor disagree=4, Agree a little=5, Agree somewhat=6, Strongly agree=7**

<table>
<thead>
<tr>
<th></th>
<th>Statement</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
</tr>
</thead>
<tbody>
<tr>
<td>65</td>
<td>There are many things around you that makes you annoyed</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>66</td>
<td>There are lots things which make you frequently upset</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>67</td>
<td>You as individual often remain calm and nothing around you bother much to you</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>68</td>
<td>You somewhat emotional person.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>69</td>
<td>You are hot tempered person who may get angry quickly.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>70</td>
<td>When unhappy over an issue you let people know it right away.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>71</td>
<td>When you are discouraged you feel confused.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
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### Appendix C

#### Demographic Multi Analysis of Variances (MANOVA)

<table>
<thead>
<tr>
<th>Factors</th>
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<th>Age</th>
<th>Academic Qualification</th>
<th>Length of service</th>
<th>Martial status</th>
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<tr>
<td>OJS&lt;sub&gt;a&lt;/sub&gt;</td>
<td>F</td>
<td>0.041</td>
<td>F 2.443</td>
<td>F 1.471</td>
<td>F 1.748</td>
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<tr>
<td></td>
<td>P</td>
<td>0.891</td>
<td>P 0.041&lt;sup&gt;*&lt;/sup&gt;</td>
<td>P 0.234</td>
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<td>PrJust&lt;sub&gt;b&lt;/sub&gt;</td>
<td>F</td>
<td>2.261</td>
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<td>0.047&lt;sup&gt;*&lt;/sup&gt;</td>
<td>P 0.496</td>
<td>P 0.703</td>
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<td>Esprt&lt;sub&gt;d&lt;/sub&gt;</td>
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<td>F 0.624</td>
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<td>P 0.179</td>
<td>P 0.569</td>
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<td>P 0.721</td>
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<td>Self estm&lt;sub&gt;g&lt;/sub&gt;</td>
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<td>F 0.811</td>
<td>F 0.481</td>
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<td>P 0.527</td>
<td>P 0.617</td>
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</table>

Note: OJS= Over all Job satisfaction; Prjust= Procedural justice; Jbtrg= on job training; Esprt= Esprit de corps; Workcond= Working conditions; Clrt= Job clarity; Self estm= Self esteem; Efbf= Efficacy belief; Nrtc= Neuroticism.
Appendix D

Job satisfaction Normality Q-Q Plot and Boxplot

Normal Q-Q Plot of job

Outlier detection Box plot
Outlier detection Box Plot

Procedural Justice Normality Q-Q Plot and Boxplot
Outlier detection Box Plot

Job Training Normality Q-Q Plot and Boxplot
Outlier detection Box Plot

Normal Q-Q Plot of esprtcorp2

Esprit de corps Normality Q-Q Plot and Boxplot
Normal Q-Q Plot of newesteem

Outlier detection Box Plot

Self esteem Normality Q-Q Plot and Boxplot
Normal Q-Q Plot of working conditions

Outlier detection Box Plot

Working conditions Normality Q-Q Plot and Boxplot
Appendix E

Covering letter

Dear participants,

My name is Jamshed A Halepota and I am a postgraduate student at Brunel University, London, United Kingdom. I am conducting a research project to better understand employee job attitude to determine employee job satisfaction experience in the healthcare professionals serving in public hospitals in Pakistan and find out more about the job related feeling needs of the employees.

This is an anonymous survey whereby all responses will remain Confidential. The data collected will be used for academic purposes only and has been approved by the Brunel Business School ethics committee. The results of this study will help healthcare policy makers and human resources managers to better understand employee job experiences and provide strategies that result in effective and efficient workforce which provide quality Health service to end users and better understand needs.

Your participation is strictly voluntary; however, researcher really values your help in filling in the questionnaire, it will take only about 15 minutes to complete.

Any further information or if you have any queries, please contact me: Jamshed.halepota@brunel.ac.uk

Jamshed Halepota
Room No. 120
Chadwick Building
Brunel Business School
Brunel University, London
UK
Appendix F

Research Consent Form

Required for research involving human participants

**Title of Research:** Determinants of Employee job satisfaction

**Researcher:** Jamshed A. Halepota, PhD Student, Brunel Business School, Brunel University

**Contact Information:** Jamshed.halepota@brunel.ac.uk

**Purpose of the Research:** To examine the employee job attitude and behaviour by applying work attributes and personality aspects for job satisfaction

**What is involved in participating?**

Your involvement is voluntary and you can decide to refuse to answer any question or even to withdraw at any point from the project. Anything you say will only be attributed to you with your consent: if not, the information will be reported in such a way as to make direct connection with yourself impossible.

Confidentiality also means that the questionnaire will be coded and stored in such a way as to make it not possible to spot them directly with any individual (e.g. they will be ordered by number rather than by name)

**Consent:**

I wish to be identified in the report- YES ☐ NO ☐

I have read the above information and I agree to participate in this study

(Please tick) ☐

Researcher’s signature: ___________________________

Date: ____________________