There is an extensive literature concerning Psychosomatic illnesses. Causative role of changing sociocultural background and psychological factors in relation to psychosomatic disorder were explained in diverse ways. One thing should be remembered that there are wide variation in the findings which in turn may reflect the different methodological procedures used.

The purpose of this section is to review some aspects of psychosomatic illnesses to show the extent of the problems and works done by different investigators.

**STUDIES ON PERSONALITY**

The psychosomatic diseases represent the physiological concomitant of an emotional state. The experience of emotional arousal, either suddenly or unexpectedly or prolonged recurrence, all have potentials for disturbing the physiological functioning. This fact is now well established in both clinical and experimental observations. In the present study an attempt has been made to show the studies of different investigators who tried to present evidence that emotional disturbances play a part in the etiology of different psychosomatic diseases.

Moos (1964) reviewing over 80 studies on emotional factor in Rheumatoid Arthritis concluded that emotion plays an important role in these illnesses and he also found that there is less agreement in personality pattern. Kidd & Watt (1967) also admitted the importance of emotion in case of skin disease. Studying 161 men, selected adult patients whose age ranged between 15 to 49 years established this fact.

On another group of patients (Cardiac) Sutter (1968) and Bærnum (1969) studied 48 & 165 patients respectively to find out the relative significance of emotional factor in precipitating these diseases. They observed that diseases triggered by emotional strain and conflicting situations. In addition to this Bærnum got an
interesting finding that the frequency of heart failure was more among subjects who lived in family with close interpersonal relationship than those who lived alone.


Cochrane (1969) tested the Sainsbury's hypotheses that hypertensive patients were intrinsically more neurotic and his study supported this hypothesis.

Heise & Sainsbury (1970) correlated the blood pressure of male and female of 35-64 years old depressed patients who had recovered from their illness and matched them with controls to find out the relationship between prolonged emotional disturbances and rise in blood pressure. Results indicated that the repetition of depressive illness when characterised by anxiety, agitation, it caused a sustained rise in blood pressure.

Mekegney et al (1970) studying 123 patients with ulcerative colitis or chronic diseases were also able to establish the fact that high incidence of emotional disturbances and life crisis is responsible for such suffering.

Reykowski (1971) reviewed the studies on the relationship between emotional functioning and consequent visceral changes. Standard tests as 16 P.F., M.P.I., M.A. scale and a questionnaire of behavioral sample was developed and administered on psychosomatic patients and on control group. In this study differences were found in reaction to stress, subsequent emotional problem and duration of emotional responses. The difference was also found among various psychosomatic illnesses as peptic ulcer, colitis ulcerosa, hypertension and asthma. In addition, psychosomatic patients appeared much less suited for social and productive behavior. Islikwa (1971) showed that anginal attack might be induced by physical stress or emotional stress. As a psychological characteristics emotional reaction as anxiety, hostility towards the source of trauma, disease and problem in human relationship was significant.
Again Labhardt (1975) in studying the etiology of psychosomatic illness stressed mainly on emotional factor. He presented several case histories to illustrate the influence of psychological and emotional conditions in psychosomatic illnesses. Standardized psychological and biological tests for identifying the emotional basis of illness were described. He also discussed the problem in identifying and treating these illnesses.

From these studies on different settings with different scales, a clear picture of body-mind relationship or psychological & somatic relationship is found where emotional disturbances is a psychological aspect whose expressions in somatic form is found, whether in heart disease, colitis, hypertension, skin disease or in arthritis.

Many investigators attempted to find out the neurotic trend of the patients suffering from different types of psychosomatic illnesses and whether they were more introverted or extroverted.

Sheffield & Corney (1976) using E.P.I & M.A. Scales found that psychosomatic patients were not only significantly more neurotic and introverted, they were also more anxious than the non-psychosomatic medical out-patients. The same result regarding neuroticism was also obtained by Smart et al (1976) on anorexia nervosa. They using E.P.I., Cattel's 16 P.F. Form A measured not only neuroticism and extroversion but also alert poise and independence of patients suffering from anorexia nervosa. They also administered Leyton Obsessional Inventory to measure the obsessional trait and Raven's standard progressive matrices was also used to measure intelligence. The result showed that these patients were more anxious, dependent, obessive and average in intelligence. But the opposite picture is found regarding introversion. The patient group was less introverted than the control group. But Stonehill & Crisp (1977) on other population using E.P.I., showed that the patients of anorexia nervosa had high level of introversion before treatment. They also found that these patients had neurotic trend. There was a tendency to lower anxiety and obsessional scores, neuroticism and higher extroversion score on the E.P.I. after treatment.
Similarly, Moos and Soleman (1964) showed that rheumatoid arthritis patients were not only neurotic but also depressed. Lichman (1967) cited certain past clinical studies to show the mechanism how anxiety, anger & depression might work.

Studying 100 dysmenorrhoes patients Prill & Franz (1970) showed that these patients were neurotic, anxious and had tendency of transposing strongly affected experiences into somatic reaction. The role of anxiety in psychosomatic illness was also explained and proved by Freyhan (1976) & Whitehead (1977).

Psychosomatic diseases have both psychological and somatic aspects which are interrelated. Personality is an important psychological aspect. From this review it is found that many investigators studies personality aspects of arthritis, headache, dysmenorhea, hypertension, skin disorders and other diseases falling under psychosomatic illnesses. They used various tools viz. 16 P.P., E.P.I., M.A., M.M.P.I., Scales or projective techniques to probe into certain aspects of personality. Most of them mainly stressed on such factors as emotional anxiety, frustration, hostility, tension, extraversion or introversion and neuroticism. Comparing with suitable group, most of the investigators got significant results in respect of these factors. But it can be concluded that no specific constellation of personality traits are related in any way with any of these disorders. One thing should be noted that the above investigators stressed only on different dimensions of personality which are associated with psychosomatic disorder. But no attempt has yet been made to study the relationship among the different personality variables of psychosomatic illnesses. Here there is a scope for further probing in this line.

In psychosomatic illnesses, the psychological symptoms are manifested in physical symptoms. These physical symptoms are so dominant that their mental source is not superficially recognizable. The patients mainly complaint of anorexia, vomiting, headache, backache or palpitation but do not mention anything about their anxiety, depression, resentment or sexual tension. In investigating physical condition, study of personality is necessary so that psychosomatic
component of organic disease may not be overlooked. The factors such as anxiety, aggression, guilt, resentment, depression, neuroticism and frustration may act as the cause or an aggravating factor in the production of ill health which is manifested at the somatic level. The study of these factors may help to predict why does an individual respond to specific life events or particular social situations and they way through which symbolic stimuli may bring the susceptibility to somatic illnesses. The study of these factors may also help in predicting what are the psychological characteristics of individuals who most readily become ill or complain of bodily symptoms.

STUDIES ON SOCIOCULTURAL FACTORS:

Certain studies have put emphasis on various social & environmental aspects & have attempted to correlate them with psychosomatic dysfunction in different population. Some investigators have stressed on a particular social or cultural aspects of the psychosomatic disorders.

Halliday (1946, 1948) from his extensive study in England predicted that social factor may be partly responsible for changing incidence of various psychosomatic disorders from time to time from culture to culture. Ehrstrom (1951) & Tyroler & Cassel (1964) tried to find out the relationship between urbanization & psychosomatic illness.

Ehrstrom (1951) in a study attempted to obtain the rate of incidence of psychosomatic illness among Eskimos in North Greenland. He compared two groups, one of which was primitive, illiterate people and the other group was those who had contact with Western civilization (Danish). The result showed that psychosomatic disorders were more common, near about four to five times among the later group.

In their study Tyroler & Cassel (1964) compared coronary heart disease mortality in two groups. The first group consisted of middle
aged male American of British ancestry, who had been brought up in rural area but subsequently exposed to urbanization without changing residence due to rapid growth of village. The other group of people with whom the first group was compared had been brought up in exclusively urban condition. The result showed that the mortality of coronary heart disease were increasing among urbanized rural group within 10 years than the urban group.

An interesting study was carried out by Scotch (1960). He illustrated the psychosomatic effect of racial discrimination and segregation. In the union of South Africa he obtained blood pressure measurement of male and female Zulus in an urban and rural community. These measurements were compared with other published data showing the average blood pressure measurements of American males and females and the average for White and Negroes living in a biracial community in Georgia. From the interpretation of result he remarked "any condition of social stress which proved tension or anxiety in any of the individual's role, assumptions will have an observable and sometimes measureable impact on the total personality".

Result also showed that Negroes living in Georgia have higher average blood pressure in both younger and older age group and in both sexes than the whites. In comparison to Americans, Negroes were more hypertensive than white in the same community. Blood pressure of Zulus living in rural area were slightly lower than those of Georgian whites but the Blood pressure of urban Zulus were higher than the rurals—of course not so high in the Gorgian Negroes.

The above studies give an indication that psychosomatic disorders are the ill effect of urbanization.

Certain extensive large scale studies of some investigators showed the relationship between the psychosomatic diseases & socioeconomic status or class e.g. the studies of Passamanik (1957) & Hollingshed & Redlich (1958) & Scout (1960).

Passamanik (1957) in his Baltimore study tried to determine the prevalence of chronic diseases and its variation with socioeconomic status. He began his studies with Roberts Lemkan Krueger (1957) in 1952. They did it in two stages—firstly, the members of a random sample of 4000 households were interviewed by them about
their health; secondly, a 10 percent sample of these people was studied according to the nature of illness on the basis of first clinical examination. They reported a total prevalence of 9.3 per 1000 for psychotic, neurotic and psychosomatic disorders combined in the non-institutionalized population.

In 1950 "The New Havana" study was carried out by Hollingshed & Redlich (1958) to test five clearly formulated hypotheses about relation between social class & mental illness. The character of the population was urban and the size 250,000; the social structure of which had already been extensively studied. They found that patients of class V who had poor living condition tended to react to stress by antisocial reaction, hostility and psychosomatic symptoms. The result of these two studies were again tested on comparatively smaller groups by several investigators.

Silverstone (1970) undertook a survey to find out a relationship between social class and obesity. He weighed and measured a random sample of 329, 20-59 years old patients in London. He found that age and social class was related with obesity, mainly among women.

Vatankhah (1970) described his experiences with 497 Iranian women whose age were within 30 years, suffering from psychoneurotic & psychosomatic illnesses in respect of their social status. He found that in 299 subjects the disturbances were associated with social situations. There were three main groups (1) Patients with marital problems (2) patients with hereditary constillations and (3) patients in whom professional and training handicaps were pathogenetic. In all the groups tensions and conflicts arised from specific attitudes and circumstances whether in seclusion or in subordination in which Iranian women were living. Meeting with western pattern of attitude they were in conflict with their attitudes which caused many subjects to be insecure and fearful. Those individuals experienced their social status by suppressing their personality which caused frustration and selfdirected aggression after a period. He also found that open aggressiveness were shown by persons suffering from psychosomatic disturbances. The first two
groups were depressive, phobic and anxious, none of them except 2 in 3rd group spontaneously solve their problems. He remarked that diseases served as means of evading a decision of choice between old tradition and new western pattern of living.

Schwab & Schwab (1975) in discussing the concept of "Social therapeutics", stressed on the contribution of social condition to psychosomatic illness. To support this concept he cited example as (a) increased psychosomatic disorder among the poor, (b) "omalaise" in the over worked, (c) increased risk of coronary heart disease among people who had accepted the social desirability of aggressiveness, ambition & competitiveness and (d) "hysteric" epidemic in the repressive society of the Victoria era.

Thus from these studies a positive, consistent & coherent picture is found regarding social class or status & psychosomatic illnesses. Besides the effect of social class on psychosomatic illnesses, group of investigators attempted to probe into the relationship between culture & psychosomatic illnesses.

Seney & Redlich (1968) reviewed social and cultural factors in causation of neuroses and psychosomatic illness. They selected cultural, subcultural, large & small group to find their effect on these illnesses. It was concluded that there was probably significant amount of cultural invariance which means that the same basic syndrome might appear in different setting and these syndrome modified by them in form and cause. Subcultural system highly influenced certain behavior as drug addiction alcoholism and sociopathic. Subcultural factor contributed more variances than culture. Small group system, mainly the family, was more important than any large group in contributing psychological and somatic disorders.

Groen (1970) presented evidence that psychosomatic illnesses are culturally induced. The changes in the psychosocial interaction of the members of its cultural and social subgroups is a stressful situation which demands adaptive responses. Depending upon the adequacy of responses the members of subgroups may remain healthy
and subjected to deviant behavior or diseases.

Singer (1975) discussed the role of culture in determining similarities and differences in the prevalence and manifestation of psychosomatic illness. He tried to identify the cultural elements that caused variation. But he did not get much evidence to support beliefs about the existence of major differences between cultures in psychosomatic illness as a whole. A primary core of illness is common to all culture which is influenced by different culture. But real difference exist in the prevalence of certain conditions in a minority of culture, e.g. it appears that peptic ulcer is more prevalent in southern India, Hypertension in American Blacks & functional sexual disorder among certain communities in the Orient and Middle East of lower prevalence. Coronary heart disease is more common among Japanese and ulcerative colitis in certain nonwestern people.

Wittkower & Warnes (1974) also surveyed the cultural etiology of psychosomatic disease. The influence of race, life expectancy, eating habit, personality, psychosocial stress were also discussed regarding prevalence of cardiovascular and gastrointestinal disorders.

Again a group of investigators attempted to throw light on occupational status & psychosomatic illnesseses.

Syme (1968) also found that subjects reporting four or more major job changes or two or more geographic move since 16 years of age, suffered more by coronary disease than the control subjects who had not changed their jobs and residence.

Sales & House (1971) attempted to study the correlation between job-satisfaction and morbidity in coronary disease. They interviewed 12 different white coloured occupational groups (Librarians, Advising professions, school teachers, physicians, Auditors, Engineers, Technicians, Managerial job holders, Book-keepers, Clerks, Salesman, workers). They measured inherent intrinsic job satisfaction and extrinsic satisfaction (pay satisfaction, job security, workssetting & coworkers). Four point scale for 'very good' (low score) to 'very poor' (high score) were used to find out satisfaction item. Result suggested that there was a relationship between the total jobsatisfaction and incidence of
coronary heart disease. The greater the job satisfaction the lower the chances of coronary heart disease. Mainly there was a higher co-relation between intrinsic job satisfaction and heart mortality.

Waldron (1978) studied the coronary prone behavior pattern, blood pressure of 40-55 year old women. The hard driving style of life was associated with an increased risk of coronary heart diseases. In this study it was found that coronary prone behavior pattern was associated with high occupational status. In case of women it is not related with the occupational status of women's husband or whether she was currently married. Thus it can be concluded that coronary prone behavior pattern might be related to success in the traditional male occupational role, but not to a woman's success in the marital role.

The interesting fact is that no contradictory result is also found regarding the relationship between occupational status and psychosomatic illnesses.

Some attempts were made to explain how adverse condition of a family may facilitate psychosomatic illnesses.

English (1967) reported the importance of family structure in causing psychosomatic illnesses. Whereas Brandon (1968) reported the disorder of apetite whether inapetite or voracious eating were associated with a family or individual's characteristics. His study revealed that faulty pattern of parent-child relationship in the family is associated with such disorders.

From the entire socioeconomic range of population Swift and Associates (1967) picked up 80 juvenile diabetes and compared them with the control group of normal school children. They found that the emotional tone of the families of the diabetes were significantly worse than the tone of the control group. Similarly, Stein & Charles (1971) comparing the family background of adolescent diabetes with a matched group of non-diabetic chronically ill adolescence observed that the incidence of deaths in the family, separation, divorce and family disturbances such as severe illness, emotional conflicts were significantly high in diabetes.
An interesting finding was revealed by Vidal Teinider (1969). Analysing the data of 14 psychosomatically ill subjects, 7 organically ill control and 4 neurotic control, he found that persons suffering from psychosomatic illnesses had a tendency to negate conflicting familial situation whereas neurotic and organically ill subjects treated them openly.

Considerably a new approach was done by Vatankhals (1970). According to him there is a clash between ancient custom of traditional large family and modern small families which follow the Western family. The younger generations want to free themselves from the authority of the traditional family. The tension arises from these situations causes neuroses and psychosomatics among younger generations. However, young people, mainly women who were especially exposed to the modern changes in Iran were treated in the hospital. "Hence the conflicts and neurasia suffered in the traditional intact family group could not be ascertained. It is concluded, however, that the negative aspects of the breaking up of the traditional social group and the assumptions of Western pattern are outweighed by the positive aspects of individual freedom and independence. Groen (1974) hypothesized that psychosomatic illness may be caused by frustration which induced in some people during their communication with key figure in the family or in work groups to which they belonged. There are some people who are more resistance to such psychosocial stress due to hereditary a education which are characterized by adequate consistent conditioning. But there are other people who are easily frustrated in psychosocial situations and develop illness.

A bit different study was carried out by Hau & Ruppell (1966). They studied the family constellation of psychosomatic patients. They took information regarding members, sex of the siblings, patients position among other siblings from 415 hospitalized psychosomatic patients. Analysis of the information showed that (1) Middle position of female patients had no predisposing influences in the development of psychosomatic diseases, (2) position in the family had no significant influence on the organ system in which symptoms developed, (3) the position of the eldest had a lower rate of developing illness in the cardiovascular symptoms. The result of
this study was partly supported by Meiners Gerd (1978). He investigated the relationship between the incidence of psychosomatic disorder and the patient's position among other siblings. The result though revealed that the middle child category was overrepresented and the only child category underrepresented in the sample studied but no significant difference was found in the relationship between the position among siblings and psychosomatic disease.

It is found that works on familial interaction is not enough from which something stable conclusion can be drawn up. From these studies a provisional conclusion can be drawn up that family disturbances may influence the psychosomatic illnesses.

The man is not only a biological organism but also a social being. To understand the psychosomatic conception of man, it is necessary to study them as individual, mind-body complexes interacting continuously with social and physical environment in which they are embedded. From the studies on socio-cultural factors mentioned above it can be said that, to-day, a relative more emphasis is also given on psychophysiological responses to environmental or social stimuli. The social variables are urbanisation, poverty, migration, condition, and relation with a job, family interaction and disruption. The result of investigation with the social factors give response in favour of the impact of these factor in disturbing the homeostatis of the individual. The above factors are obviously most significant as these impose adaptive demand on the organism. But the fact is that the effect of such factors on health depends on the person's coping capacity, social supports and other factors.

STUDIES ON BRONCHIAL ASTHMA:

There were various studies carried out by investigators on bronchial asthma. They attempted to throw light on this disorder according to their own view point.

Medermott & Cobb (1939) in a study interviewed 22 male and 28 females asthmatics for two hours. In most of the cases emotional
Neurotic traits were found in two thirds of emotional group and one third of non-emotional group. The result also revealed that all these patients were obsessive. The fact that asthmatics were neurotic, were supported also by the result of Koninckx et al (1970). The result of F.N.P. Questionnaire and Rosenweg picture Frustration test showed that the subjects of Koninckx et al (1970) were also irritable and they had persistent tendency to turn aggression against themselves.

Oswald et al (1970) had done a comparative study with asthma and bronchitis. Two personality testing form, the E.P.I. Form A and the Cattell's self analysis Form, were administered on 471 hospital patients (275 were male & 196 were women). The result showed that there was tendency towards neuroticism, anxiety & introversion for all the categories, but the scores were slightly higher for bronchitis than the asthmatics. They also considered that this anxiety & neuroticism might be due to that they were suffering from childhood or duration was many years.

Teirans (1978) also found no neurotic trait of both allergic and non-allergic asthma from M.M.P.I. study. From the psychic point of view women differ more according to the duration of illness than men. The result of this study show a strong interdependence between the course of asthma, psychic and psychosocial factors. If a person has good psychosocial adaptability, matured personality and ability to endure stress, it exercises a beneficial effect on the duration of illness and whereas unfavourable psychic or psychosocial factor affect adversely the root of incurability and duration of illness.

Rees (1956a) studied the importance of various etiological factors such as psychological infective and allergic. Among his subjects he found that psychological factors were dominant in 37%, subsidiary in 33%, unimportant in 30% cases. He also found that definite emotional factor exist in 20-57% cases. Again in (1956b) he found dominant psychological factors in 44% cases in a Random sample of 50 patients aged 60 or more. He also found that psychological factors were predominant in those patients whose onset were after the age of 45 years. Leigh & Marley (1956) administered Cornell Medical
Index on two groups of asthmatics (one attending a general medical and the other attending a psychiatric clinic) and compared them with neurotics and normal control group to study the personality pattern of asthma patients. Both groups of asthmatics produced scores intermediate between the two control groups. Of course, the score of patients of the psychiatric clinic were very similar to those of the neurotics. The result was also supported by the study of Franks & Leigh (1957). The result also suggested that in case the subjects who had low level of introversion or a lack of psychic symptoms, prognosis was good. Freund (1970) stressed mainly only frustration suffered by the bronchial asthma patients. He showed some cases in which after an improvement during hospitalisation the symptoms started again after the discharge of the patients which were especially serious in case of asthma children. It was suggested that for this, asthma children should stay at 'Homes' for some periods after their improvement.

Besides the personality factors, some investigators studied the adjustability of asthma patients. Of them Arndt et al (1969) compared 50 asthmatics with a control group of other patients in a psychosomatic clinic by using Rorschach techniques and colour selection and colour pyramid test. They concluded that asthmatics had a more unexpressed feelings against the social environment, they may be typically maladjusted.

Knapp et al (1976) found not only evidence of interpersonal adjustment difficulties but also a high score for dominant and tender mindedness.

Benzamin (1977) also found a significant difference in social adjustment when he compared 53 asthmatics with 50 matched control. He also found that presence of mental illness, age of onset, family history of asthma or other atopic condition were not associated with asthma.

Jacob et al (1976) tested the hypothesis that life situations characterised by failure, unresolved role crisis and social isolation were related with the presence of respiratory illness.
Life changes Inventory, the manifest effect rating scale and the Boston University Personality Inventory were administered on 106 male college subjects with various severity of dysfunctioning and 73 normals to test the hypothesis. The result supported the hypothesis.

The importance on the relationship between birthorder and asthma was given by Weiss (1968) & Ikemi (1974).

Weiss (1968) hypothesized that the respiration of first born asthmatics were more vulnerable to the effect of stress than those who born latter. The test of hypothesis showed that in case of first born asthmatics emotion was an important factor in precipitating their asthma, (2) showed dramatic symptom remission following hospitalization, (3) significantly these symptom reduced after experimental separation from their family. It was assumed that birth order is an index variable referring to a host of psychological factor that characterised the members of ordinal position.

Ikemi (1974) studied the birth order and age of onset of bronchitis asthma in 137 Japanese. It was found that 74% of the asthmatics were first born, 1st son or daughter, last child or only child. All of them have a unique status with special implication of dependency in their family. The age of onset was before 10, this episodes occurred after marriage (separation from mother).
STUDIES ON PEPTIC ULCER:

Many authors studied different aspects of peptic ulcer. Some one studying on physiology or anatomy, others on psychological and social aspects. Here the studies included which seem to be relevant for the present investigation.

Davis and Wilson (1937) studied 205 cases of peptic ulcer, comparing them with 100 cases of herna to find out the relationship between the emotional stress and the onset of symptoms. They found that in experimental group in 172 patients, symptoms developed after some emotional stress, but it developed only in 22 cases of the control subjects. There were also evidence that before onset they were highly concerned with matters of security, responsibilities and independence. Below the age of 25 years most frequent precipitating events was change of job, after 25 years changes of income predominated. They also found that sexual difficulties were almost absent.

Mittleman & Wolff (1942) investigated the personality of 30 unselected patients with peptic ulcer and three with gastritis and deudenities. Though individual differences was found in many features of personality but some reactions as, intense anxiety, insecurity, resentment, guilt and frustration was obtained in all patients.

Tidy (1943) showed that Gastrointestinal symptoms were increasing and at the same time Cardiovascular symptoms were decreasing among the solders in World War II as compared with the solders in World War I. The underlying cause of which was the social and cultural circumstances that contribute to the alternation in the form of psychosomatic reaction.

Harris (1946) attempted to find out the effect of frustration.
and hostility among 200 ex-military servicemen who were admitted to a hospital for minor psychiatric illnesses. The Chief symptom of 25 patients among others were the complaint in the upper gastrointestinal tract. They had history of onset of illness during some period of military service. It was reported that to these men, this symptom was nothing but a visceral protest against pressure and regimentation they faced in their military life.

Wolf & Wolff (1947) reported a case where they observed the changes of mucosa of stomach under different circumstances. This patient had a fistula or surgical opening into the stomach due to an accident at the age of nine. He was observed for 17 years. Comparison of gastric mucosa showed that his stomach underwent different physical changes in different circumstances such as frustration, anger. Observations at the time of anxiety, tension, resentful guilt, humiliating experiences indicated an extreme over activities of the stomach leading to nausea and epigastric pain.

Mahl (1949) attempted to find out the psychological and physiological basis of ulcer formation. He included 8 subjects for his study. Stomach acidity was measured by him just before an important college examination and also during non-tension control period. Six subjects out of 8 showed no increase in acid secretion before examination but two of them showed a slight decrease of acid secretion. He found that motivation played a role in decreasing of secretion of acid. One of the two students who failed to show an increase in stomach acidity under the stressor condition was very casual about the examination. The others were indifferent about the coming examination. He showed that the stress of these persons depended upon the pattern of motivation and the life situation to which they were exposed.

Mahl & Karpe (1953) analyzed another female patient suffering from peptic ulcer to study the relationship between the intensity of emotion and the degree of acid secretion to evaluate the effect of oral dependency needs. They observed that increased acid secretion was dependent upon the anxiety.
Kellock (1951) compared the early experiences of 250 patients suffering from duodenal ulcer with 250 patients suffering from other diseases. He found no differences in respect of the positions of the patients among the siblings, mothers' age at the time of birth, the positions of patients in the family, the death of parents or separation and frequency of remarriage of either father and mother.

Wolf & Bovine (1955) attempted to analyze the stomach contents of five ulcerative and non-ulcerative patients under a stressful situation on two successive nights. On the 2nd night stress situation was introduced by the Experimenters by suggesting to the subjects that they had stomach pathology. It was observed that acid volume of the non-ulcerative patients increased markedly than the ulcerative group on the 2nd night. This was thus explained by them that the ulcerative patients were chronically anxious and hence there was maximum secretion of acid before the experiment.

Steckle (1956) reported another case of an employee working in a medical laboratory, whose oesophagus was closed off due to a childhood injury. There was a opening into the stomach through which food was placed. As part of his stomach was turned outward, it was possible for the investigator to observe the changes of colour of the stomach under different environmental conditions. His stomach became pale and activities decreased when he was frightened by the thought of losing his job. When he became angry, resentful, anxious his lining of stomach grew red, engorged with blood, activities of stomach and secretion of acid increased. It was also shown that if mucous was wiped away under such emotional condition, then acid secreted at that time eat away the exposed surface & thus ulcer was formed.

Weiner, Thalar, Raiser & Mirsky (1957) and Mirsky (1958) studied on physiological, psychological and sociological determinants in the etiology of ulcer. Their subjects were a group of healthy persons working in the army (which was traumatic to them). In physiological parameter the concentration of serum pepsinogen was considered as an index of gastro secretion. It was found that secreting cell mass was
greater in the patients than the healthy individuals.

Several psychological tests such as Blacky test, Saslow Questionnaire, Rorschach test were administered to find out a psychodynamic constellation. This was correlated with hypersecretion and hyposecretion of pepsinogen.

Psychological evaluation also revealed that these patients had a major unresolved and persistent conflict with their need for dependent oral gratification. Social determinants of duodenal ulcer were the environmental events which will prove noxious to the particular individual.

It was also concluded that each of these parameters is an essential but not the sole determinant in the formation of ulcer.

Wolpe (1958) illustrated a case of 46 years old single dressmaker suffering from ulcer. She was seen by the therapist. She had epigastric pain which was alleviated by medication, but still felt nauseated at the sign of slightest interpersonal disturbances. Her symptoms were removed after a follow-up study for 18 years with the improvement of interpersonal functioning.

Castelhuove - Tadesco (1962) examined the emotional antecedent in 20 patients suffering from perforated peptic ulcer. He suggested that "perforation syndrome might be a depressive equivalent of the climax of an emotional conflict in which the patient consciously or unconsciously felt damage to his self esteem and to which he reacted with impotent rage".

Heller et al (1953) studied the activity of stomach in anxiety. They selected 10 hospitalized patients, five of them were suffering from gastrointestinal symptoms and five with no complaints. The experimenters induced anxiety by indirectly suggesting to the subjects that they had some serious illness. They reported that acid secretion was increased with the increased anxiety.

Posey & Gilman (1963) studied 30 ulcer patients, 30 ulcerative colitis cases and compared them by 30 normal controls by TAT cards. Significant differences between the 3 groups were found. The ulcer patients had high achievement needs, a lack of creative imagination, had reluctance to relate to the social group. The ulcerative colitis patients inhibited passive compliant attitude and an exaggerated...
tendency to avoid stressful situation.

Rutter (1963) attempted to study the hypotheses that psychiatric and social factors may affect the mode of reaction of an individual to a physical illness (Peptic ulcer) and thus influence its course.

He studied 80 patients attending at London Government Hospital during six months of 1960. He measured variables as demographic characteristics, social class, smoking habit, social adjustment in six areas as work, marriage, sex, relationship with parents, siblings, relationship with children & social life and recreation. He also studied psychiatric symptom, psychiatric disability and certain traits which characterised the individual's whole adult life. The report of patients regarding stress during onset of illness were also included in the study.

In result, physical and social factors were not found to be predictive value. He also found that anxiety and depression at the time of first attempt was associated with a poor prognosis. In case where psychiatric disability and depression occur at the time of onset, outcome is significantly poor. Significant relationship was found between affection symptom and the patient's report of previous stress. But the relationship between stress and outcome of illness was weak.

It was also found that 39 patients out of 80 were adjusted in all aspects but the 40 patients were unadjusted in one or more sphere. The unadjusted individuals suffered more with frequent ulcer pains.

Poilrenaud & Parot (1967) studied the influence of ulcer pains on the psychological structure in 104 subjects. These subjects were divided into 3 groups, (1) 26 subjects with previous ulcer demonstrated by X-ray, but no pain for 3 years, (2) 30 subjects with established ulcer and persistent pains and (3) 48 subjects without any ulcer history. The MMPI was used to evaluate these subjects. Those with painful ulcer were more anxious and neurotic than those without pains.
Pilot et al (1967) studied the case material of 175 women with duodenal ulcer to find out onset, course, symptoms and laboratory findings and to know whether there was any difference in the history of ulcer disease in pro and post menopausal women. 62 subjects were interviewed by a schedule and other 41 were interviewed by psychiatrist for grading the degree of anxiety and character disorder. Significant differences were found in ratings anxiety and character disorder between the two groups.

Eberhard (1968) investigated 120 pairs of twins of the same sex with confirmed gastric or duodenal ulcers. Experimental test included color word test, rod & frame test, spiral after effect test, level of aspiration test, meta contrast technique and a simple test in verbal intelligence. Further information was obtained through personal interview with relations. Results showed ulcer twin to be more ambitious, sensitive to criticism, moody, restless and less short tempered than the controls. A psychogenetic theory was formulated and it was concluded that the most important factor for the etiology of peptic ulcer are hereditary, the stronger their influence the less is the scope left for environmental factor in the pathogenesis.

Beudoward et al (1969) compared 20 patients suffering from peptic ulcer with the same No. of normal persons in the same military unit in respect of temperament. The most common morphology among the ulcerated subjects was the leptosome type ulcer accompanied by a marked vagotonic tendency. Guilford - Zimmerman temperament profile was administered on them and the result showed a significant difference between these two groups of subjects, the ulcerative subjects appeared less active, more contracted and timid and emotionally less stable.

Savastano (1969) tested 19 male and 6 female adults suffering from whose mean age were 38, 18 subjects were Brazilians and 7 were of other nationalities. Results were analyzed according to age, sex and nationality and by comparing with the controls Plutchik's Emotional Profile Index was proved valid and 2 hypothesis were confirmed: (a) emotional profiles of ulcerative subjects differed from controls and (b) emotional profiles of ulcerative subjects were constrictives and ambivalent.
Hollinderj & Soulls, Alan (1971) reported that 7 patients among 15 peptic ulcer patients hemorrhaged after confronting by conflict situations 1-3 days prior to bleeding which they could not resolve. This situations caused an intense feeling of frustration, helplessness and despair among these patients.

Barcai (1972) described two cases of male peptic ulcer. In both the cases manifestation of illness occurred when insolvable problem confronted the patients. In case of one patient episodes of bleeding from duodenal ulcer occurred when his diabetic daughter developed alopecia areata and psychiatrist confirmed that family problems especially difficulties in communication caused it. The other developed nausea, vomiting and diarrhoea at night before he was scheduled to take the oral part at the American Board of Child Psychiatry. It is hypothesized that due to the restrictions in the situations, the patient experienced an overwhelming emotional arousal which caused extreme activities of normal physiological process. Such state leads to psychophysiological decompensation and precipitation of physical symptoms.

Meloni (1972) remarked that gastrodeodenal ulcers were found both among population that experienced spatial changes e.g. Migrants, and those whose biological circadian rhythms had been interfered with cardiac problems were associated with stress in conjunction with lack of physical movement and also with blocking of emotion, such as occurs in a depersonalized urban society.

Trombini (1975) in a symposium on peptic ulcer described constructions of Psychovisceral Reactivity Test (P.R.T.), consisting of a series of geometric puzzles, 2 of them were difficult for the patients and one was easier. His aim was to identify psychic conflict that induce varying degree of emotion, tension and accompanying specific visceral responses. The P.R.T. was used to examine the motor secretory activity of a group of patients suffering from duodenal ulcer.

Laniranchi (1975) in the same symposium on peptic ulcer described the use of G. Trombini's Psychovisceral Reactivity Test to investigate the relationship between emotional situations and gastric secretion and motility. 11 patients with duodenal ulcer responded to the frustration and conflict elicited by an motility and an increase of secretion. It is suggested that these gastric modification may play
a role in the pathogenesis of gastric ulcer. In that Symposium W. Stewart (1975) remarked that ulcer patients were characterized basically not by an exaggerated secretary activity but by a complex gastric activity that was unduly sustained.

Christedoul et al. (1977) studied 17 girls and 8 boys, the age of whom were 6–16 years in respect of psychological, psychosocial and psychiatric aspects. They compared these ulcerative subjects with such children who had no history of peptic ulcer. Both the group were matched for age, sex and socioeconomic status. Result showed that there was unexpected female preponderance. The experimental group was more introverted than control. Among the experimental group 5 patients suffered from psychiatric disorder, 3 had history of suicidal attempt, 8 had an operation for appendicitis and 3 had homosexual experiences. These were absent in the history of control group. The ulcer subjects had more I.Q., worse adaptation to school, more anxious and over protective parents, frequency of faddiness in food and lower frequency of nailbiting than the control group. In 8 cases it was found that psychoTraumatic event preceded the ulcer. The result also suggested that environmental factor and personality of patient strongly influence the development of ulcer.

Segal (1978) compared the characteristic of 105 patients with duodenal ulcer with those of matched and unmatched samples of patients without gastrointestinal conditions in the same hospital in Johannes-berg. The data were used to test Susser's proposition that duodenal ulcer were associated with urbanization.

The patients were matched for age, sex and inpatient and outpatient status. They were selected randomly and interviewed by several questionnaire as medical officer's schedule (short & long), the sociological schedule and anxiety schedule. Men with duodenal ulcer were found to be significantly better educated than the control, most of them were born in the town and were employed in higher educational level. Their findings showed that persons suffering from duodenal ulcer were the younger in age. From the anxiety test it could not be concluded that patients with duodenal ulcer were relatively more anxious or tense.
The research on peptic ulcer and bronchial asthma speaks us that in certain factors, such as emotion, anxiety, neuroticism, frustration, hostility, extroversion and introversion there are similarities in findings.

But various methods are used in studying peptic ulcer which are not found in case of bronchial asthma.

Regarding Birthorder dissimilarities in studies are found where in case of peptic ulcer no difference is found in respect of position among siblings. Whereas in case of bronchial asthma most of the patients are first born or only child. Here lies a scope for further investigation of the relationship between birth order and psychosomatic illnesses.

In social aspects, impairment in interpersonal relationship and social adjustment are found in both cases of ulceratives and asthmatics. In case of peptic ulcer maladjustment is also found in work situation, marital, sexual, parental relationship.

At a glance it can be said that research on adjustment areas are few both in peptic ulcer and bronchial asthma. An attempt can be made to throw light on this aspect.
STUDIES IN INDIA:

Several studies on psychosomatic illnesses of Indian background are considered in a separate sub-section so that information relevant to the present study can be reviewed.

Goswami & Barua (1969) carried out a study in Assam, to probe into certain epidemiological & psychological factors by analysing causes of peptic ulcer. The result showed 60% cases were Hindu, 36% cases were Muslim and 4% cases were Sikh Christians. This indicated the pattern of population of Assam, not that the Hindus suffered more. The socioeconomic status of studied patients were such as 15% cases were from upper class, 20% cases were from upper middle class, 26% & 39% were from lower middle class and low paid worker respectively.

In the psychological aspect, this investigation showed that 33% were docile, 15% were normal, 55% cases were highly strung with psychological stress. In all these cases unpleasant emotional experiences either persistent or often repeated were present in form of anxiety, tension, frustration, hostility or depression. This predominance of emotional disturbances were also observed by Ramchandran et al (1977) on asthmatics. Their studied subjects were 100 asthmatics, 100 tuberculosis patients, 100 normals were selected as control. They administered M.M.Q. & C.M.I. to all patients. They observed that 45% asthmatics showed anxiety, tension, sensitivity, depression. Neurotic trait was also observed in asthmatic than the other two groups. This result was also supported by Srivastava et al (1975 & 1977). At the first time they studied 200 skin patients by P.G.I. Health questionnaire and next time 50 male skin patients by M.M.Q. In both the cases they found that functional skin disorder patients and patients with scrotal involvement were more neurotic than the control and organic skin disorders respectively. They also developed a short extraversion scale. By administering this they found that in respect of extraversion there were no difference between patients of scrotal involvement and control group. Dissimilarities in findings regarding extraversion was found in the study of Sreedhar (1976), Dutta (1978) & Seth...
et al(1978). Sreedar(1976) studied groups of peptic ulcer, irritable bowel syndrome (I.B.S.), hypertension and bronchial asthma patients comparing them with patients suffering from neurosis and physical illness. He measured extroversion and introversion and neuroticism with M.P.I. The result showed that peptic ulcer, I.B.S. and bronchial asthma patients were introverted and neurotic; patients suffering from hypertension were high in neuroticism, patients with neurodermatities did not differ from control and physical illness regarding extroversion and neuroticism. The subjects of Dutta(1978) comprised of 50 peptic ulcer patients (40 males and 10 females) along with a control group of 25 normal Volunteers (20 males and 5 females) who were studied by M.P.I. They were matched with respect to age, sex, areas of domicile and as far as socioeconomic status. 8th class is the minimum educational status for selection of the cases. The result showed that they were not only neurotic & introverted but also anxious, irritable, obsessive and had blurring of vision.

Sethi et al(1978) attempted to study (1) the pattern of psychosomatic disorder in general hospital, (2) the socio demographical variable to assess the degree of neuroticism, psychoticism and extraversion amongst the psychosomatic patients. The sample consisted of 60 consecutive psychosomatic patients. The control group consisted of 40 subjects who were derived from the same medical ward. Analysis of result showed, there were only four types of psychosomatic patients viz. Hypertension, coronary heart disease, bronchial asthma and dermatitis. Results of Eysenck's PEN Inventory showed that these patients were also neurotic and introverted as like those patients who were studied previously by other investigators.

Sociodemographical variable revealed that age of 38% of the psychosomatic patients were between 15-40 years and 65% belonged to age group of 41 years or above. The group comprised of 73.3% and 26.7% female patients. The educational status of the subjects were illiterate (36.7%), primary (8.3%), upto inter (46.7%) and graduate & above (8.3%). 38.3% of the subjects come from joint family constellation & 61.7% from unitary family.
Shyanmugam (1979) also made a similar study. His subjects consisted of patients suffering from asthma (47), Gastric ulcer (44), Ischemic heart disease (36). A control group of 49 individuals were chosen from general population after screening them for physical illness in general. The result of B.P.I. showed the psychosomatic group was more neurotic and extraverted than the control group. The interesting finding was that the cardiac group was more extraverted than the bronchial asthma and peptic ulcer group and asthmatics were more neurotic than the other two psychosomatic groups.

A new approach was done by Indira and Murti (1979) who used the Indian modification of TAT to measure the Hostility of psychosomatic patients. 28 females and males of five diagnostic groups viz. Bronchial asthma (N=9), peptic ulcer (N=6) and neurodermatites (N=6), Essential Hypertension (N=3) who were high on general punitiveness and intrapunitiveness on hostility. Direction of hostility questionnaire formed the experimental group. They were drawn from different socio-economic level, mean age was 39.17. 14 normal controls matched for relevant variables. They were low on general punitiveness and intrapunitiveness than psychosomatic group. Result of TAT showed that there was no significant difference in hostility and Guilt score between experimental and control group.

Ramchandran (1977) studied the parental deprivation on asthma and Madhukar et al (1979) on essential hypertension. Both the studies failed to demonstrate that parental loss was in any way significant in causation of these diseases.

The studies in psychosomatic illness in Indian background are found to be relatively insufficient than the studies abroad. Those who worked mainly stressed on psychological aspects. In this aspect they dealt with personality factors. They investigated with different tools on different population. But the result showed that emotional disturbances, tension, depression, extraversion, introversion, anxiety, neuroticism influence the psychosomatic illnesses.
If we compare the results obtained by the Indian authors with those of the Western countries regarding personality factors, it appears that in respect of emotion, neuroticism, depression, anxiety, obsession & tension absolutely there is no difference. Further, the controversy regarding the factor extroversion and introversion is present in Western set up as well as in Indian set up. But the controversy regarding the factor hostility is only found in Indian studies, which is absent in Western Studies.

The studies on social aspect in India is found to be very insignificant. But a new approach is only done by Sethi(1974) who showed that patients suffering from psychosomatic illnesses are coming mainly from unitary families.

The reviews so far made by the present author, no study is found on family constellation of psychosomatically ill people in Western set up. In Western countries there is basically no joint family. Whereas in India though social changes affect the family constellation, still there are both joint and unitary families. It is well known that the influence of a unitary family upon individual psyche is different than that of a joint family. So an attempt can be made here to probe into this aspect on Indian background.

Again it is found that only one work was done by an Indian author on social class and psychosomatic illnesses. So it is necessary to study further, on this line to come to a stable conclusion in this matter in India, which will also help to check up the controversies existed in the Western Studies.

Thus again it is to be noted that in the Western cultures, the method of child rearing practices are completely different from those in India. The over socialization of social class, urbanization are rapid in those countries. Due to economic influence they lead a very fast life. Whereas India is a developing country. Here the social changes are occurring very slowly. The rate of socialization & urbanization are not so rapid. Socioeconomic status can be viewed as potentially stressful as because poverty is enormous in India. The life lead by the Indian people are not so fast like those of Western people. From these various points of view it can be said that the whole
social milieu of sociocultural set up of Western Countries are completely different from those of India.

Hence there is enough scope for studying the relevancy and feasibility of social factors adopted and employed by the western authors in the Indian background.

From the review of literature it is observed that although many studies were undertaken on psychosomatic illness and personality but consideration of specific facts of personality, its relation with psychosomatic illness was not fully covered. Besides this, the pattern of clustering the different facts of personality in different types of psychosomatic diseases was not touched at all. Furthermore, studies on psychosomatic disorders in the frame of Western culture and social milieu are expected to differ from those of Indian Culture and Social milieu. Because of the Differences in the nature and character of socioeconomic frame and cultural pattern, field forces operating the two context will differ and eventually their relationship with psychosomatics will also differ. Therefore, there is a need of scope for undertaking research on psychosomatics in Indian context.

On these consideration some tentative hypotheses may be formulated for the present study.