

A Triparte Perspective on Population Pressure

Christopher L. Salter

I. *Margaret Sanger's General Theory of Overpopulation:*

The most far-reaching social development of modern times is the revolt of woman against sex servitude. The most important force in the remaking of the world is a free motherhood. Beside this force the elaborate international programmes of modern statesmen are weak and superficial. Diplomats may formulate leagues of nations and nations may pledge their utmost strength to maintain them, statesmen may dream of reconstructing the world out of alliances, hegemonies and spheres of influence, but woman, continuing to produce explosive populations will convert these pledges into scraps of paper; or she may, by controlling birth, lift motherhood to the plain of a voluntary, intelligent function, and remake the world. When the world is thus remade, it will exceed the dream of statesmen, reformer, and revolutionist.¹

So began a small book published in New York in 1920. After this powerful opening paragraph the author went on to say

Caught in this vicious circle (of too many children and resultant poverty), woman has, through her reproductive ability founded and perpetuated the tyrannies of the Earth. Whether it was the tyranny of a monarchy, an oligarchy or a republic, the one indispensable factor of its existence was, as it is now, hordes of human beings—human beings so plentiful as to be cheap, and so cheap that ignorance was their natural lot. Upon the rock of an unenlightened, submissive maternity have these been founded; upon the product of such a maternity have they flourished.

No despot ever flung forth his legions to die in foreign conquest, no privilege-ruled nation ever erupted across its borders, to lock in death embrace with another, but behind them loomed the driving power of a population too large for its boundries and its natural resources.²

The title of this explosive little book was *Woman and the New Race*. Its author was a slender mother of two children, a registered nurse and public health worker. Her name was Margaret Sanger. With this slight tome, which went through three printings in less than six months, Margaret Sanger declared war on established policies of Church and State, traditional mores of society, and the evil of overpopulation. This battle has been one of the most significant factors in the development of the 20th century.

The author, Mrs. Sanger, had had her stimulating and provocative education in two distinct settings. She had her academic training with the famed English psychologist,

Havelock Ellis. Her practical, and equally influential education, came in her work as a public health nurse in the crowded slum and immigrant districts of New York City.³ It was amid these crowded, filthy ghettos serving as home, playground, and schools for thousands of immigrants per block that she repeatedly saw the plight of families burdened with children they were unable to support. Levels of nutrition were low and incidence of disease was high. Schooling was almost impossible to complete because of the pressure on the children to earn extra money to keep their younger brothers and sisters alive, and, worst of all, family relations were constantly strained because of the associated worry and tension with these conditions. This environment produced both crime and misery.

The solution seemed natural and simple to Mrs. Sanger, so in her public health work and in her magazine "The Woman Rebel," she began to formulate a plan for amelioration of this situation. She decided an educational program was needed that would teach parents how to be able to plan the arrival of children. Planned parenthood, she felt, would not only make every child a wanted child, but it would enable families to live within their means. This education was not only necessary for the restriction of the quantity of children but, easily as important, the improvement of the quality of children. With fewer family problems caused by overcrowding and underrearing, the children would be able to grow up under more favorable conditions and have a better chance to get a good education. This factor alone would raise both the cultural and economic levels of society.

In the first decades of the 20th century, Mrs. Sanger was a woman almost alone in her fight for birth control. She was put in jail a number of times because of the laws prohibiting the distribution of materials pertaining to contraception and birth control. Though never prosecuted, she was persecuted by reactionaries from all sides. It was only her conviction that the majority of women and families wanted the information she had to give that gave her strength to endure. She has been fighting steadily for almost 60 years. The work that she started at the time of the First World War has now spread to all parts of the world, and literally millions of families have been directly aided by the work done by various family planning organizations. More than 62 countries have family planning organizations. They have all grown from the small office Mrs. Sanger opened in New York over fifty years ago.

To better understand the philosophy of Mrs. Sanger, let us look more closely at the book which delineated her reasons for her campaign against the collective ignorance of those involved in parenthood. From this understanding we can more easily comprehend exactly what family planning is.

The first part of *Woman and the New Race* deals with the misery and destruction caused by overpopulation. From the quotation above one can see that she finds "a population too large for its boundaries and its natural resources" the cause of war and imperialism. She develops this idea by saying

In every nation of militaristic tendencies we find the reactionaries demanding a higher and still higher birth rate. Their plea is, first, that great armies are needed to *defend* the country from its possible enemies; second, that a huge population is required to assure the country its proper place among the powers of the world. At bottom the two pleas are the same.....The "need of expansion" is only another name for overpopulation. One supreme example is sufficient to drive home this truth. That the First World War, from the horror of which we are just beginning to emerge, had its source in overpopulation is too evident to be denied by any serious student of current history.⁴

To substantiate this claim, Mrs. Sanger shows the relatively low birth rate of the neutral countries (of the First World War) and France and Britain. Their collective average is about 26 children born per thousand people. She then notes that Germany and the other Axis powers had averages of more than 36 births per thousand. She says

Owing to the part Germany played in the war, a survey of her birth statistics is decidedly illuminating. The increase in the German birth rate up to 1876 was great. Though it began to decline then, the decline was not sufficient to offset the tremendous increase of the previous years. There were more millions to produce children, so while the average number of births per thousand was somewhat smaller, the net increase in population was still huge. From 41,000,000 in 1871, the year the Empire was founded, the German population grew to approximately 67,000,000 in 1918. Meanwhile her food supply increased only a very small per cent. In 1910 Russia had a birth rate even higher than Germany's had ever been—a little less than 48 per thousand. When czarist Russia wanted an outlet to the Mediterranean by way of Constantinople, she was thinking of her increasing population. Germany was thinking of her increasing population when she spoke as with one voice of a 'place in the sun.'⁵

Her warning here much resembles the pointed warning Dr. Sun Yat-sen gave in his lectures on Nationalism in Canton in 1924. No people know better the aggressive power of an overcrowded nation than the Chinese. They have had Japan's bitter lesson of 1937 to 1945.

Moving on from the discussion of horror on the international scale because of overpopulation, Mrs. Sanger discusses the pain and misery brought to society and individual families by uncontrolled population growth. In the fifth chapter she says:

The most serious evil of our times is that of encouraging the bringing into the world of large families. The most immoral practice of the day is breeding too many children. These statements may startle those who have never made a through investigation of the problem. They are, nevertheless, well considered, and the truth of them is abundantly borne out by an examination of facts and conditions which are part of everyday experience or observation.

The immorality of large families lies not only in their injury to the members of those families but in their injury to society. If one were asked off hand to name the greatest evil of the day one might, in the light of one's education by the newspapers, or by agitators, make any one of a number of replies. One might say prostitution, the oppression of labor, child labor or war. Yet the poverty and neglect which drives a girl into prostitution usually has its source in a family too large to be properly cared for by the mother, if the girl is not subnormal because her mother bore too many children, and, therefore, the more likely

to become a prostitute. Labor is oppressed because it is too plentiful; wages go up and conditions improve when labor is scarce. Large families make plentiful labor and they also provide the workers for the child labor factories as well as the armies of unemployed. That population, swelled by overproduction, as a basic cause of war, is already seen. Without the large family, not one of these evils could exist to any considerable extent, much less to the extent that they exist today. The large family—especially the family too large to receive adequate care—is the one thing necessary to the perpetuation of these and other evils and is therefore, a greater evil than any one of them.⁶

It is important here to remember that Mrs. Sanger was not speaking of the 'extended family. She was relating to a miserable, crowded urban environment. Whereas the Chinese traditionally see the large family in a context predominately rural, with the theoretical associated benefit of many children, Mrs. Sanger saw the large families living with 7 or 8 or 11 children in one-room apartments squeezed into the worst buildings found on the fringes of metropolitan New York. She saw family after family, newly arrived from foreign lands, unfamiliar with either the language or the customs of their new country living in conditions that could produce nothing but more misery, and, sadly, more children. She accused the people who permitted these conditions to exist of "animalizing the immigrants instead of Americanizing them."

What she saw in her everyday work was intensified by the number of letters, calls, and requests that she got asking for help and advice. She said these cries came from all directions and from all levels of society. The vast majority were from parents who already had 3 or 4 children and now wanted to concentrate on the raising of them. Margaret Sanger's campaign was not against children. It was against misery and poverty and destitution.

In the next major section of the book, Mrs. Sanger speaks of the various means of birth control. She discusses the impracticality of relying on continence as an effective method because of the nature of man's body and his desires. Rhythm is also discouraged because of the uncertainty involved and the percentage of times this system fails. Abortion is shown to be a relatively dangerous operation if the embryo has had several months to develop. Relative to this is the fact that abortion has always been illegal in the United States unless the mother's life is in danger. Therefore, almost all of the abortion that goes on is clandestine, and all too frequently the doctors involved in it are not of the highest calibre and operating conditions are often far from optimum.

Therefore the most effective solution to the problem is contraception. The principle of contraception is simply that of not permitting the union of the sperm and ovum, thereby eliminating conception. In Mrs. Sanger's point of view this was both the safest and the most humane method to control the growth of family and population. When she was comparing the solution to the problem of too many children in the upper classes and the lower classes, she made the point that

...a high percentage of women in comfortable circumstances escape the problem of too many children by the use of contraceptives. A similarly high percentage of women not in

comfortable circumstances are forced to submit to maternity, because their only alternative at present is abortion.

She continues commenting on abortion and family planning with

When society holds up its hands in horror at the "Crime" of abortion, it forgets at whose door the first and principal responsibility for this practice rests. Does anyone imagine that a woman would submit to abortion if not denied the knowledge of scientific, effective contraceptives?The abortionist could not continue his practice for twenty-four hours if it were not for the fact that women come desperately begging for such operations. He could not stay out of jail a day if women did not so generally approve of his services as to hold his identity an open but seldom betrayed secret.

The question, then, is not whether family limitation should be practiced. It *is* being practiced; it has been practiced for ages and it will always be practiced. The question that society must answer is this: Shall family limitation be achieved through birth control or abortion? Shall normal, safe, effective contraceptives be employed, or shall we continue to force woman to the abnormal, often dangerous surgical operation?⁷

So, again, the problem is turned over to society. One of Mrs. Sanger's most important points in the book is this fact that societies have traditionally practiced some method of family limitation. It has been embodied in national policies of infanticide and exposure in both the Occidental and the Oriental worlds. If it was not practiced more frequently in the past, it was because the forces of nature, in the past less modified did the limitation for the general populace through the ghastly mediums of famine, plague and war. The question Mrs. Sanger asked in 1920 can still well be asked today. When will society practice overtly and intelligently the family limitation that it has practiced behind closed doors since time began? When will society take this obligation away from the deadly forces of disease, starvation and war?

The remainder of the book deals with the difficulties of disseminating educational materials about contraception in the United States. Mrs. Sanger asks for intelligent legislation and cooperation from the general public. Bit by bit Mrs. Sanger got the latter. Though the government has never given family planning overt support, it has tolerated it in most states. The fight, however, has been going on steadily and even as late as 1962, cases against some of the organizations promoting family planning were in the American courts.

The progress of a social revolution is not to be counted in years or even in decades. As distinct as the beginning may be, the conclusion is never fully discernable. It is the same with Mrs. Sanger's impact and policies. The birth rate of the United States has decreased considerably since the early years of her battle, with subsequent elevation of the standard of living, level of education, and national wealth of the country and population. Family planning and moderately stable population growth have been large factors in this prosperity.

In a letter to this writer, Dr. Stuart Sanger, who was writing for his ill mother, Margaret Sanger, said that Mrs. Sanger was "interested and enthusiastic about" the work

that was going on in Taiwan.⁸ She was informed that the various family planning organizations here were trying to stress the fact that family limitation did not mean a departure from traditional family closeness, but rather, that it was a program through which each family could afford to give its children the love, care and education children need and tradition demands. It is hoped that a voluntary program of intelligent family planning will also make easier the present complex transition from the traditional agricultural society to the more demanding industrial society. This will assure a more prosperous and content future Taiwan populace.

II. *Historical Antecedents of the Chinese Large Family System*

One of the biggest stumbling blocks in the introduction of the concept of family limitation to Chinese society is the large-family philosophy so important to early Chinese thought and, hence, to tradition. Although this philosophy is not unique to Chinese society, because of the extended period of time China has practiced it, it has become a more powerful tradition than in other agrarian countries.

In view of the fact that Chinese philosophy has had and continues to have such a powerful influence on all phases of Chinese Society, let us look more carefully at the conditions that prevailed during the formulation of much of this rich body of thought. The Golden Age of Chinese philosophy was from the 6th to the 3rd century B. C. In that short span of four hundred years the schools of Confucius, (孔子) Mencius (孟子) and Hsün Tzu (荀子) were developed. Lao Tzu, (老子) Yang Chu (楊朱) and Chuang Tzu (莊子) also lived and spread their teachings. Also Mo Tzu, (墨子) and Han Fei Tzu (韓非子) formed their two distinct schools of thought. Although the dogma varies considerably in some of these schools, their combined importance and influence on tradition is highly significant.

Another curious feature of this concentration of sages and mental activity is that this period was coincident with the great flowering of Western philosophical development in the Greek world of Socrates, Plato, Aristotle and their disciples. It was also at this time that the Gautama Buddha began one of the world's most influential religious schools in still another part of the ancient world. Jainism also finds its roots in this period and Hebrew thought was exceptionally fertile and creative. No subsequent period in history has had as strong a collective influence on succeeding generations: for though there have been later eras of intensive creativity in different culture worlds, never has there been such cross-cultural, simultaneous appearance of great minds and thought. Our intent here, however, is to explore only the Chinese development.

In the Chinese culture world we are interested in two particular features of this period. The first, a peripheral influence is the diminution of empire that preceded the period of philosophical development. The capital of West Chou (西周) was established in 1121 B. C. on the far reaches of the Wei River. (渭河) However, because of a combination of weak government, poor governing and internecine wars, power was lost and the Chou clan moved their capital east to near Honanfu (河南府) in 770 B. C.⁹ This was the beginning of East Chou. (東周) The actual impact that this decrease in area and population

had on philosophical thought is speculative, but because of the overriding concern for politics in the schools of Confucius and the Legalists, (法家), it is safe to assume that lessons were drawn from this retreat. All schools were concerned with national prosperity and subsequent expansion of empire. Important to realize, however, is that the methods of empire expansion were vastly different in the different schools. The Legalists and Han Fei Tzu were far more concerned with military conquest than the other schools; yet, common to all was the realization that abundant manpower was essential to the expansion of China. Therefore we must consider this diminution of empire as an influence in the large-family philosophy that grew from the thinkers of this period.

The second consideration is the most dominant factor in the philosophical and political development of China. It is the nature of the land occupied by East Chou. East Chou, during the Ch'un Ch'iu Ch'an Kuo period (春秋戰國) embraced parts of the provinces of Shantung, (山東) Hopei, (河北) Shansi, (山西) and Hupeh (湖北) or an area of approximately 800,000 square kilometers, or an area 20 times larger than Taiwan.¹⁰ Not only was the area large and under-populated during the time in question, it was particularly rich land. It was in this area that the Chinese culture originated along the hinterland of the Hwang Ho (黃河) and the Wei rivers. These lands were made hospitable through a number of geographical blessings, the most important of which is the wandering of the Hwang Ho on its way to the sea. The Hwang Ho has always been one of the most meandering of rivers and in sweeping from South to North across the North China Plain, it has laid down a base of thousands of square miles of some of the richest soil in the world—the yellow loess. This soil has been carried from its harsh place of origin in the interior of Asia to the well-watered and irrigable coastal regions of the continent. It has, in this new location, been one of the major causes for the agricultural self-sufficiency and prosperity of China. It was through this area that Confucius made his travels, chatting with his students and, with the later help of Mencius, laying the foundation for the family system that has today given the Mainland the largest population of any nation in the world and Taiwan the second highest population density in the world.

This area during the Ch'un Ch'iu period had an estimated population of 11,800,000 people or less than present day Taiwan.¹¹ This same area today is one of the most prosperous areas in Mainland China and supports over 115,000,000 people, or ten times the number that the philosophers saw tilling the same amount of land. It was this potential for population density that was seen by the advocates of the large family system. It was truly a land unused.

The people of the East Chou period had already a well developed agriculture that included wheat, millet, rice, and barley as the main crops; and chickens, pigs, cows and dogs had been domesticated and were raised commercially. Iron had also been introduced. Hence, the Sages of East Chou were students of an immensely rich agricultural area that supported only about 40 people per square mile. We, today, are students of a mountainous island that already homes more than 800 people per square mile. Our philosophy must be different.

The philosophic reaction to this environment of East Chou is well shown by one of Confucius' followers, Mencius, when he said that, "The unfelial have three punishments—the most severe is not to have any descendents." (不孝有三，無後爲大). Both tradition and economics called for more children. The natural resources were abundant and awaiting only the manpower to develop them. The horizons, indeed, looked to be far away.

When Confucius himself was discussing the most important verities of his philosophy he went beyond this quantitative analysis of people and family and resources and dwelt on the qualitative observation. For example, in a discussion between the Master and Tzu Lu and Master Tseng by the river Yi, Confucius is asked by Master Tseng, "What is the way of the Great Learning?" Confucius answered,

When Nature is closely studied, then true knowledge is reached. When true knowledge is reached, then thinking becomes truthful. When thinking is truthful, the mind becomes upright. When the mind becomes upright, then one's life is reformed. Then one's life is reformed, the family may be purified. When families are purified, the country will be well governed. When the country is well governed, then all under Heaven are at peace.

The necessary condition for his entire structure here is the careful scrutiny of Nature and the true knowledge which may be gained from such observation. Only with the true knowledge coming from this inspection can the individual purify his family, and subsequently, aid the country. It is this thought and ideal that we must adhere to today to do full justice to Confucius, for this was his single door to both improvement of self and country. Confucius also said there must be continued growth (生生不息) and that "Birth and life is the greatest gift Man has." (天地之大德曰生)¹²

The other schools of this time also promoted the growth of family but for different reasons. Han Fei Tzu of the Legalist's school saw a large population as a military asset. It is important to realize that war at this time was still dependent on the infantry although the states of Wu and Yueh during the East Chou period had used some naval power and there was some cavalry. The bulk, however, of a country's fighting forces was men in quantity. All men saw the country prosperous through an increasing population and the Legalists saw this prosperity as the basis for more strength, i.e. "If the country is prosperous then the army will be strong; if the army is strong then we can have expansion." (國富則兵強，兵強者戰勝，戰勝者地廣) The assets of a large population, in that and situation in that period, were manifold.

In conclusion to the discussion of the philosophical antecedents of the propensity toward numerous children, one comment must be added. Though the initial motivation of particularly the Confucian school must be regarded as highly influential, the ultimate cause of the Chinese family pattern lies in things even older than Confucius. The fact that China has always been an agricultural nation surrounded historically by weaker, less dominant neighbors (at least until the Yüan Dynasty) has promoted growth in population in relationship to the resources available. The birth rate in China has traditionally been high, but the population did not really start to increase with great speed until the introduction of Western medicine and intensive farming crops that were suited to hillside

agriculture in about the 17th century.¹³ Medicine and expanded food supply started to lower the mortality rate and this gave impetus to the population expansion associated with the peace and the benevolent monarchy of the early Ch'ing Dynasty. By this time the ideas of the Confucian schools, and all others, were fully imbued with tradition and the large family pattern was established. The combined force of philosophy and tradition have now carried the Chinese into the height of the Industrial Age still producing families geared to the rural era. It is this incongruity that family planning is trying to eliminate.

From the earliest of sources we turn to one much more contemporary, though just as important in modern thinking. This is the population policy of Sun Yat-sen (孫中山) as delineated in the *San Min Chu I*. (三民主義) The major consideration given to population and birth control is in the first of his lectures on Nationalism given in Canton in 1924. At that time he commented on the rapid growth of population in the industrializing countries of America, Russia, Germany, and Japan, but found that the Chinese population appeared to be standing still. From this vantage point, he foresaw the ultimate domination of China by other nations which were increasing their population relatively rapidly. To quote Sun Yat-sen

When I compare their increase (the industrializing nations) with China's, I tremble. Look at the United States.....it will have one thousand millions at the end of another century..... A hundred years ago (the Chinese population) was four hundred millions; (Today it is four hundred millions.) then a hundred years hence, it will still be four hundred millions.¹⁴

Should such be the case, there would indeed be cause to follow word for word the development policy of Dr. Sun which stressed the need for more rapid and extensive population growth. But, as only we with hindsight can see, the population pattern of today's countries shows that China still far and away has the largest population of any country in the world. Part of the error in Sun's thought was caused by faulty statistics. He claimed a Chinese 1795 population of 400 million. For 1900 he assumed the same population, and he quickly saw the resultant lack of growth.¹⁵ The fact of the matter is, however, that recent detailed studies done by Chinese scholars at Harvard University and The University of British Columbia show that in 1795 the population was 296,968,000 people.¹⁶ By 1850 it had already increased to over 429,000,000 people. Therefore by 1924, when Dr. Sun was speaking of population, the Chinese had already added at least 150,000,000 people to the total population since 1800. Although this growth fails to parallel the Malthusian growth pattern, and is also a lower rate of growth than the industrializing nations discussed by Dr. Sun, it is an absolute gain that would have set some of Dr. Sun's fears at ease. Since 1900 another phenomenon has taken place which also demands that we question the forewarnings of Dr. Sun. Because of the further industrialization of the United States and the adoption of birth control practices by many families on a voluntary basis, the population growth rate has decreased considerably. The prognostication that there would be ten Americans for four Chinese by 2024 could not possibly materialize without some miracle or calamity. Therefore we should look beyond the actual discussion of population

statistics by Dr. Sun and draw from his other writings the spirit of development and prosperity that he saw as so possible and essential for China.

In Dr. Sun's "*The International Development of China*" are a series of practical, though sometimes expensive, solutions to the economic underdevelopment of China.¹⁷ In this book one can see the ultimate concern Dr. Sun had for the economic well-being of his people. In his discussions of food, clothing, and housing transportation, industrialization, and political development; one is again and again aware of Dr. Sun's pragmatic approach to the difficulties of China's situation in the 1920's. Because of this spirit, it is not difficult to assume that Sun Yat-sen would be in agreement today of a thorough study of the conditions that exist on Taiwan; and, having evaluated the economic, social, and political conditions, he would be willing to start on a program that seems as new and revolutionary today as did his own 60 years ago.

If we understand then, that the philosophy that has moulded tradition and political policy for several milliniums has been a response to particular sets of circumstances that no longer exist today; and if we look beyond the absolute policies promulgated during times that had different considerations to be met, then we should be able to transcend the absolute and find value in the spirit and the ultimate meaning of the teachings of men from Confucius to Sun Yat-sen. All of the great thinkers of Chinese history that have shaped thought and custom have had the welfare of the Chinese people in mind. Their concern has been collective whether the most important unit has been the family or the country, the individual or the race. Now, in 1964, Taiwan is faced with conditions that have never before existed in Chinese history. Never has piece of land been so crowded and been faced with so little room for expansion.

The test now is to see if the spirit and intent can be drawn from the wealth of Chinese philosophy and political theory and be applied to a unique circumstance. This will be the test of true governing ability. The pressures are such that it is necessary that the government play a more active role in the solution of this problem.

III. *Economic Aspects of Taiwan's Population Pressures:*

This spring's announced decision of the United States Agency for International Development (AID) to eliminate Non-military economic aid to Taiwan has caused a good deal of concern to both governmental and academic economists. The assumption that Taiwan can develop a self-sustaining economy in the "near future" and can keep it in the black without the heretofore crucial \$100 million U. S. aid annually, demands a careful consideration of several aspects of the present status of the Taiwan economy. This section is a consideration of perhaps the most important of all these aspects—population and Taiwan's present need for a population policy.

According to the AID director in Taiwan, Howard Parsons, "abundant manpower" is one of the strong features of the present Taiwan economic picture. This same abundance, however, may also be construed as one of the most difficult problems the immature Taiwan economy will have to cope with in its struggle for stability and steady growth.

This "abundant manpower" can be both helpful and harmful.

The reason this apparently paradoxical situation exists is that terms such as "surplus population", "population pressure" and "population policy" are difficult to define as absolutes. The term that seems to be the keystone for the comprehension for these ambiguous terms is "surplus population." If this term can be defined, then the severity of Taiwan's present population pressure can be comprehended and the subsequent need for a population policy will be seen. How, then, can "surplus population" be defined?

Approaching the problem from the semantic aspect, a surplus can be defined as "that which remains when use or need is satisfied." Translating that to the world of economic practicality, it means population that is not actively employed, or is classed as disguised unemployment in some sector of the economy; the people who are not producers at either the industrial, commercial or agricultural levels. This same surplus, however, plays, in the schools of some economic theorists, a very important role simply because it lies outside the realm of direct productivity.¹⁸ Historically a surplus of labor has enabled management to establish low wage rates which are often influential in low production costs and consequent lower market prices. This ability to market goods produced at a competitive rate means more profit for the producer and, assuming you have a politico-economic system that is moderately stable, this profit is reinvested in either new capital formation or expansion of present plant facilities. This in turn requires more labor.

This very process is the basis for the desired economic development in the country that has this abundance of labor. Variations on this condition were significant in the economic development of mid-18th century Britain and in the Industrial Revolution. These conditions have been essential up to the mid-20th century and the rise of Japan as an industrial nation. They presently are important in Hong Kong industry. The difficulty in the present consideration of this "cheap labor development" sequence is the relative lack of market for Taiwan's labor-intensive goods and the subsequent lack of adequate industrial absorption of this surplus population. For if the surplus population is not fairly rapidly integrated into the economic structure of the developing country, it puts too much of a burden on the wage earning sector. The consumers (the majority at a subsistence level) too greatly out-number the producers.

Although the industrial production of Taiwan has increased impressively in the past decade, this increase has not been accompanied by sufficient creation of employment opportunities. Even with wage scales favorable to management, the number of new jobs opened in the industrial employment sector has been less than 200,000 since 1952.¹⁹ In that same period the population has increased by more than 4 million people.

If the surplus population fails to be productive, owing to a lack of a medium through which they can transform their low cost working ability into domestic development, then can they be considered as an asset in any other aspect? The answer that many economists would give is that they become a consuming force of considerable magnitude, and thereby again stimulate development. The weakness in this point of view is twofold. First of all, the largest population group in Taiwan is under 15 years of age. To be exact,

45.9% of the present Taiwan population is younger than 16 years old. The consumption level of this group is restricted by the fact that they are not economically productive and therefore have little capital to spend in constructive consumption. This is not the group that will buy the more modern light industrial consumer goods (toasters, fans, small appliances, etc.) which will support new industries. Rather the needs of this group are met by already established light industrial firms in the textile, toy, bicycle line, etc. This group is admittedly a consuming group but not significant in its contribution to the capital necessary for further investment and appreciable industrial development.

Another aspect of this young age structure is that the majority of the families in Taiwan have more than 4 children in addition to other non-employed dependents, so that most of the available cash is spent on basic necessities and an insufficient amount is saved at the individual family level. This is magnified at the national level because of the small quantity of the money available to the average family and because of the marginal nature of many of Taiwan's business concerns. That is to say that there are a great number of family concerns which supply the fundamental needs of food and clothing to the low and middle income population group and in so doing just manage to stay profitable but are not able to amass sufficient capital to really stimulate significant re-investment. This pattern is easily discernable through simple observation of the variety of labels of food and clothing goods available in the great number of small store-home units in all of Taiwan's towns and cities.

Therefore the surplus population is neither producing nor consuming in quantity sufficient to aid the program for Taiwan economic development and economic self-support.

To understand more fully the implications of this young population, consider the future. Even if no more children were to be born in the next twenty years, the labor force of the island would more than double from simply the aging of today's population. Already in the major field of economic employment (agriculture) has over 1,000,000 people classified as "disguised unemployment in agriculture."²⁰ In 1952 the number of workers needed in the agricultural sector of the economy was 1,792,000. In the last decade, with a population increase of more than 4,000,000 people, only 83,000 have found new employment in agriculture.²¹

During the same period, industry supplied less than 200,000 new jobs. Clearly the population is increasing more rapidly than are the job opportunities for this expanding labor force. If we look to the future we see that the labor surplus waiting in the wings to come on stage is even more terrifying than the more than million people un- and under-employed already on stage.

Observers still intent on finding positive aspects of the present population picture often note that in the future the picture will be modified by new fertility rates and the higher educational level of the present younger group. Neither of these factors, when scrutinized, offers much solace. The natural birth rate of the population of Taiwan has decreased less than .4 of 1% in the past 6 years while the death rate has decreased

approximately .2 of 1% so that the net reduction of the natural increase rate has been from approximately 3.4% in 1957 to 3.2% presently. This decrease, although significant in terms of sociological trends, is hardly meaningful in a discussion of the relative population surplus.

The fact that the higher educational level should be considered a total asset is also debatable because of the increased refinement of desires that comes with such education. Education will cause a person to be more concerned about his inability to find work. At the same time his felt needs are greater than the average non-educated individual, so his situation becomes more potentially troublesome. This same segment of the population is often newly urbanized populace that has come from small towns or market centers to vocational schools and then find themselves moving into the urban centers in search of an outlet for their newly acquired talent. This un-or under-employed urban group is potentially a problem group owing to various sociological aspects of crowding. This same group has often left the agrarian extended family which offered it security in the past. This further complicates the urban adjustment. The problem of surplus population clearly does not limit itself to the economic realm.

If we look then at the Taiwan population and see that for every 31 people employed, there are 69 people not economically active, and if we also note that the past decade of economic progress has still not succeeded in utilizing a great portion of this inactive segment, we can perhaps understand why it is valid to say that Taiwan has surplus population.

Surplus population, however, is only one phase of the population problem facing Taiwan. Two other aspects that are of sizable economic importance are the growth rate and the density of population. Both of these aspects of the situation warrant comment.

Taiwan's 305 people per square kilometer is second only to the Netherlands (359/sq. km.) in absolute density. This statistical similarity is deceptive because of the vast differences in the topography and land use patterns of the two countries. Taiwan has 56% of her population employed on the land and the Netherlands has only 14% of her population dependent upon agriculture. Taiwan is also limited in arable land to approximately one-quarter of her total area because of the dominating central and coastal mountain ranges. The Netherlands has some land reserve awaiting it as it dikes away the sea on its low western coast. It also has a much better established industrial and urban complex for the accomodation of the dense population, which makes the need for land less crucial.

To further complicate the present problem of density, the growth rate of the Taiwan population is one of the world's highest. With a mortality rate of less than 7 people per thousand (20% lower than the United States' rate) and a birth rate of over 38 per thousand, the rate of natural increase is 32 people per thousand per annum or approximately 3.2%. Although this rate is equalled by some countries, there can be little comparison between the relative significance of these rates of increase. To cite one example, Brazil has a rate of population growth similar to Taiwan's but Brazils' present population density is slightly above 7 people per square kilometer or less than one fortieth that of Taiwan. Therefore there is some plausibility in the economic theory that the expanding

population of Brazil will overflow into the rich, but heretofore almost totally undeveloped, interior, and stimulate subsequent economic development.

The fact that Taiwan has already utilized almost all of its easily accessible and cultivatable land is shown by the fact that the total area of cultivated land was lower in 1961 than it was in any year from 1951~1959. This stagnation is also indicative of the difficulty the government has in earmarking funds for the opening and development of new lands. While it is admitted that increased agricultural yields have mitigated the land pressure somewhat, one must remember that there will soon be a point where even technological skill and advancement will not produce enough to accommodate the steadily increasing population. Further increase in agricultural yields will necessitate increased investment in the agricultural sector of the economy and this is at odds with the program of more fully developed industry and better transportation and power facilities. Moreover, it must be noted that it will not do for Taiwan to merely maintain this gap between present population growth and crop yield increase. There must be surplus steadily gained which will enable Taiwan to earn sufficient foreign exchange to continue its program of the development of capital formation and industrialization.

The final argument against the proponents of the increased crop yield group, who too frequently dismiss any discussion of population surplus and population pressure, is the sociological one. The crowding, caused by inadequate urban facilities which become overworked as rural population is pushed out of the agrarian community by the increasing labor surplus, has a strong influence on general society. In a country less stable, e. g., several of the Latin American nations, this urban fringe of unemployed is frequently the core of troublesome groups.

An additional consequence of the particular structure of the Taiwan population is the crowding caused in the schools by the numerous youth. The number of students per teacher has been steadily increasing since 1953 and the class size has also been enlarging. Only one half of the children who graduate from primary school go on to secondary education. Both space and the need to earn money for family are factors in this decision to leave school. This augurs the increasing conflict between the preparation of quantity as opposed to quality in primary and secondary education.

Therefore not only can the existence of a population surplus be seen on Taiwan, but the growth rate and density of the population are also factors in the total concept of the population pressure and the subsequent need for a population policy. What then are the solutions to these problems?

There are three common ones that merit discussion: migration, industrialization and family planning. Each of these answers to Taiwan's population problem demands full government support if it is to be effective in the amelioration of the present predicament.

Emigration in quantity large enough to appreciably relieve the present situation is both politically and economically untenable. There is only one level of migration that is worthy of mention here. That is the encouragement of Taiwan internal migration of population, e. g., movement away from the crowded west and north and into the less

densely populated east. The rift valley from Hualien to Taitung on the east side of Taiwan does not offer a great deal of open land but it does have more potential than most economists and demographers ascribe to it. With the increased success of the east coast pineapple industry and further development of associated and secondary industries, the valley could assert a positive, attracting influence on the resettlement of surplus west coast population.²² Hualien (花蓮) and Taitung (臺東) Hsien have a combined 2,618 square kilometers of level land with a total Hsien population (including the population in the non-level areas) of 450,546.²³ Compare this with Changhua (彰化) Hsien which has an area of 1,061 square kilometers of level land but a population of 880,684 people. Changhua Hsien is 14 times more densely populated than the total area of the rift valley Hsien.

One of the important considerations of this migration potential are the farmers involved in the production of pineapple on the hilly eastern fringe of Changhua Hsien. The pilot work done by the Taiwan Sugar Corporation in the southern part of the rift valley has been quite successful and the increasingly high yield of pineapple on the east coast could be a real incentive for internal migration. Such migration will depend on the inclination of the government to improve the transportation facilities and devote more capital and concern to the east coast as a whole. While such migration is not a sizable factor now, it has taken place to a limited degree and does represent a definite potential.²⁴

Industrialization represents a solution to the problem of population for two reasons. If an economy can develop a large number of labor-absorbing industries, much of the agricultural surplus population is stimulated to migrate into industrial and urban centers. This migration causes increased urban growth which, in turn, reduces birth rates because of changed social value systems and a decreased amount of living room. Since the second factor is dependent upon the first, let us explore the development of industry more fully.

Industrialization is being promoted by the government but is handicapped by the immense military burden the budget must bear (80 % of the government funds are earmarked for defense and military expenditures) plus the less tangible hindrance of "temporality" that pervades much of the thinking of the men in the middle and high administrative posts on the island. There is obviously great hope for return to the China mainland. The economic aspect which makes present Taiwan development uniquely difficult is the amount of money needed to give reality to this promise of return.

One of the essentials for significant industrialization in an agrarian economy is a high level of saving, which facilitates investment in capital formation. The rate of saving in Taiwan, however, averaged only 6.2% of the national income from 1952~1959.²⁵ Economists generally consider that a savings level of at least 10% is necessary for economic growth to stay ahead of population growth.²⁶ If population growth is faster than growth of the national economy, the per capita income decreases and the country is regressing; the standard of living goes down. It is this very predicament that Thomas Malthus warned against in 1798, and Margaret Sanger reminded the world of in 1920 in her battle for birth control. It was also this same danger that Hung Liang-chi (洪亮吉)

(1746~1809)suggested in 1793, 5 years prior to the appearance of the Malthusian doctrine.²⁷ This plight is not new to China.

The reasons for Taiwan's low rate of saving are diverse. One of the major causes is the high number of people per family that are, as mentioned above, not gainfully employed in the money economy, thereby keeping the level of cash available to a family low. Also in the agricultural sector of the economy, the average farm size has decreased to just 1.11 hectares and this, notwithstanding higher crop yields, has kept income at a low level. Although per capita income has increased, a higher proportion of it is spent in improved farming practices and on consumer goods and this influences the low saving rate. One other feature of the Taiwan population should be mentioned regarding the use of excess capital. That is the tradition of *pai-pai*. Although its cost is difficult to document, one source has estimated that 7.16% of the annual income of the average household in Taiwan is spent in *pai-pai*.²⁸ This is doubly important in that this capital is invested not in fields that will further stimulate economic growth but in small family food and drink concerns.

To end this note on saving, it should be noted that there is not only this low level of saving, in an absolute sense, but it is lower now than it was 10 years ago. Although it has been increasing in the past few years, the rate of increase is not sufficient to appreciably change the present inadequacy.

By way of comparison to Taiwan's 6.2% average, note some of the saving rates of other countries for the same 1952~1959 period: Burma 15.8%; Japan 24.8% Union of South Africa 18.0%; Canada 13.3% and the United States 10.3%.²⁹ Not only is Taiwan's rate of saving lower than any of these countries, its birth rate is higher than all of them and almost double that of several.

Although the overall growth rate of the Taiwan economy has managed to stay ahead of the population increase in the past few years, the factor that has enabled the country to retain this safe margin has been an unnatural one. The difference has been United States financial aid amounting to approximately U.S. \$100 million dollars a year. This has been in addition to a total of 2.5 billion dollars worth of military aid. This situation was noted by the late K. Y. Yin when he said

...more than half of our net domestic capital formation (8.1% out of 14.5%) is financed, not from domestic savings, but from U. S. aid. Consequently, if there had been no U. S. aid, our rate of growth would have been much smaller. In fact, with population growing at 3.5% per annum, real per capita income would decrease³⁰

In final analysis then, neither industrialization nor internal migration solves the problem completely. Though some of the surplus agricultural population is moving into the urban centers in response to the needs of growing industry, there remains a great surplus on the land that is presently either unemployed or under-employed.³¹ As the population continues to grow and more of the younger generation find themselves faced with no job opportunities, problems will become even more serious than they are presently.

The pressure is intensifying and family planning must be seriously considered. However, before it can be effectively considered, the arguments against it must be noted. These arguments are manifold.

One is the moral issue which defines contraception as "evil". It is not within the scope of this paper to fully deal with the moral and ethical implications of the prevention of conception. When one makes even a casual study of history and notes the horror of what Malthus called the "positive" checks of population growth, i. e., war, famine, disease, it can be seen that there is good material for intelligent debate of the relative "inhumanity" of contraception vs. "positive checks." The other category that Malthus saw as a solution to the problem of over population was "moral restraint and vice." As nobody will argue in favor of the latter, it shall be dismissed as also more "evil" than contraception. This leaves moral restraint which includes primarily abstinence and the "rhythm system." The difficulty here is that though they are satisfactory to many opponents of direct contraception, they are not significant in large scale alleviation of population pressures because of their frequent ineffectiveness. Most population analysts rate the "rhythm system" as the least effective method of family planning.

One argument that is peculiar to Taiwan is the argument of the military leaders that increased population growth will give the military machine of the Republic of China essentially needed manpower. While it is admitted that manpower is essential for the successful counterattack, it is noted that general government policy states that the counterattack will be greeted by the defection both of military and civilian personnel to the Nationalist Army and the ranks will then be well filled by people already on the mainland. Another factor to consider is that just the present population will produce enough manpower to double the present ranks of the military within a decade. Consideration of return after another decade or 15 years is entirely another problematical area. Consider the logistic difficulties already in the transportation of approximately 600,000 men across the Strait of Taiwan. Could twice the number be handled effectively in a time of war? Suffice it to say that the war of the present is no longer as dependent on sheer manpower as in the past, or even in the Second World War and the Korean Conflict. The machinery which is taking the place of this manpower needs to be financed by a healthy and growing economy. A population policy geared to moderating the present growth rate of the Taiwan population and stimulating internal development of heretofore underdeveloped areas of the economy would provide such a basis.

The reluctance to turn to this form of population policy in Taiwan is interesting because, through both statistics and common observation, one can easily tell that there are a variety of family limitation methods being used in Taiwan today. These methods range from illegal abortion (which according to some population and medical authorities is more prevalent than any other method of limitation) to contraception and sterilization. All are used with the same goal in mind: The limitation of family size is to insure the betterment of the lives of those children already born. Most of this limitation is being inaugurated after the birth of 3 or 4 children or at least two boys. It is also being

practiced because of the parents' realization that additional children beyond three or four cannot be considered as economic assets in the average Taiwan family. Their support lowers the entire family's level of living. Chinese tradition is being modified by the exigencies of the present.

It is understandable that this traditional large-family philosophy would be modified when one compares its philosophical antecedents with the present. The environment that fostered the development of this tradition was an agricultural one of moderately high development which needed manpower to fully utilize contemporary resources. Growth was both normal and economically practical. (This same pattern of rapid population growth can be seen in the history of the United States in the late 18th and early and mid 19th century in frontier regions).

Because of this agricultural context, the large family grew and was in turn influential in the formulation of the pattern of extended families. The present population problem has arisen in part from the inability to superimpose this philosophy of unrestricted growth upon the limited area of present-day Taiwan. It is partly because of this unconformity that family planning has been able to make any progress at all in view of traditional Chinese thought.

The most important organization working in family planning on Taiwan estimates that they have helped approximately 20,000 families plan their offspring since September of 1961. Including the families aided by other organizations and medical experts, the total number of families reached with professional advice could be raised to a total between 50,000 and 75,000. (There are additional families that have used methods of birth control as advertised in the mass media but they frequently are used without professional advice beforehand and lack adequate effectiveness because of ignorance of the principles involved). This leaves approximately 900,000 families without professional help for intelligent family planning.³³

One of the most significant facts that has been discovered by the Michigan Population Studies Center working in Taichung(臺中)Hsien is that 92% of all the mothers interviewed (1,367 families interviewed) approve of some method of birth control. The alarming thing is that less than one-half of them knew where they could find professional help and advice.³⁴ If we can assume that this sample is even moderately valid for the island in terms of mental attitude (which it in all likelihood is), then we can see that there exists an awareness of the need of family limitation and, more important, approval of some sort of birth control to achieve this limitation. Therefore the time has come not to hide the fact that some agencies are offering medical advice and scientific aids designed to help in planning the birth of children, but rather, publicize that fact. Only in that way will you be able to acquaint parents, who are interested in such limitation, with safe and reliable means and offer them professional consultation.

It is clear that Taiwan is in need of a population policy which is more dynamic and effective than the present governmental erratic tolerance of independent agencies striving to alleviate some of the pressure. The most important thing that can be done presently

on both the island and the hsien level is the promulgation of the information that safe and effective means of family limitation are available and within the reach of all families, on a voluntary basis. Once the social stigma of family planning is removed and the political disparagement of such services is no longer evident, then the communication and education will be spontaneous and progress will be slowly, but effectively, made.

The most intelligent and effective manner of dissemination of such information is through the Provincial Health Centers which are already established. There are 364 of these health centers distributed throughout the island and rapport has already been established between the medical personnel in these centers and the populace served by them. By installing in these centers a registered nurse, a mid-wife or doctor (all of whom must have had special training in birth control practices), a great stride can be made toward the elimination of the present ignorance regarding birth control. At this most basic level, the program demands only an additional staff member (or more frequently the additional training of already employed staff members, thereby reducing the cost of such a program), the more complete utilization of present communication facilities to inform people such services exist, and the purchase of a variety of moderately inexpensive equipment.

The funds necessary to implement this program may not presently be available, but they could be raised if the proper authorities would realize the importance of the need for a population policy for Taiwan. Once a policy is formulated, either foreign foundation aid (such as the Rockefeller Foundation which has already shown interest in the Taiwan situation) or domestic funds can be allocated for the implementation of this policy.

Finally, by instituting this program in the provincial centers, the national government would theoretically be enabled to remain apart from the actual distribution of materials and need not alter its stance on family planning. It is also hypothesized that by channeling government aid and advice through the provincial centers, possible awkwardness will be avoided, which might arise if the national government attempted to induce the primarily Taiwanese rural and town population to practice birth control.

In conclusion, it is seen that a careful, objective analysis of present Taiwan economic conditions points out the existence of a population surplus. The fact that this surplus is not being rapidly enough absorbed by the growing industrial sector of the Taiwan economy has both economic and social implications. Possible alternatives to industrialization as a solution to this problem of negative population pressure are migration and family planning. Migration, although potentially offering some alleviation, does not present a long range, satisfactory solution. Hence, family planning must be considered as a voluntary program which will tend to decrease the birth rate and bring Taiwan's rate of natural increase into line with other industrializing and industrialized nations.

Through the medium of already extant facilities, the provincial health authorities can educate a large segment of the population in the ways of safe, effective family planning. Such a service would not only permit families to have the number of children desired, but would also ease some of the pressure on the existing educational and transportation facilities. This entire program would lead to both social and economic improvement in

Taiwan. Since this improvement is the ultimate goal of all people concerned with Taiwan, it is suggested that such action as is requisite be taken.

Footnotes

1. Margaret Sanger, *Woman and The New Race*, (New York: Brentano's, 1920,) 1
2. *Ibid.*, 3
3. Lawrence Lader, *The Margaret Sanger Story and The Fight for Birth Control*, (Garden City, New York: Doubleday and Company, Inc., 1955) 69 *passim*.
4. Sanger, *op. cit.* 151
5. *Ibid.*, 154
6. *Ibid.*, 57
7. *Ibid.*, 121
8. Personal Correspondence with Dr. Stuart Sanger, Jan. 18, 1962.
9. Kenneth Scott Latourette, *The Chinese: Their History and Culture*, (New York: The Macmillan Company; 1934) 46
10. *Tung Chi Ti Yao*, (統計提要) (Taipei: Directorate-General of Budgets, Accounts and Statistics, Executive Yuan, 1961) 26
11. Chang Ching-yuan, (張敬原) *Junggwo Ren Kou Wenti*, (中國人口問題) (Taipei: Syin Sheng Press, 1959) 80
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13. Ping-ti Ho, *Studies of the Population of China 1398~1953.*, (Cambridge: Harvard University Press, 1959) 280~281
14. Dr. Sun Yat-sen, *San Min Chu I*, (Taipei: China Cultural Service, 1953) 10
15. *Ibid.*
16. Ping-ti Ho, *op. cit.*, 280
17. Dr. Sun Yat-sen, *The International Development of China*, Taipei: (China Cultural Service, 1953) *passim*
18. For an interesting study of the positive manifestations of population pressure, see Albert O. Hirshman, *The Strategy of Economic Development*, (New Haven: Yale University Press, 1961)
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21. *Taiwan Statistical Data Book*, *op. cit.*, 24
22. Christopher L. Salter, *Non-utilized Potential in Economic Development: A Geonomic Study of Taiwan's East Coast Canned Pineapple Industry*, (Taipei: Industry of Free China, November 1962) *passim*.
23. *Tung Chi Ti Yao*, *op. cit.*, 28, 24. To better understand East Coast potentials see Chen Cheng-siang, (陳正祥) *Taiwan Di Chih* (臺灣地誌) (Taipei: Fu-Min Geograp-

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25. *Taiwan Statistical Data Book. op. cit.*, 168
 26. Robert Theobald, *The Rich and the Poor*, (New York: Clarkson N. Potter, Inc., 1961) 58; W. W. Rostow, *The Stages of Economic Growth*, (Cambridge: The Harvard University Press, 1960) 36, *passim*; Ragner Nurske, *Problems of Capital Formation in Underdeveloped Countries*, (Taipei: Reprinted, n.d.) 47~56.
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 29. *Taiwan Statistical Data Book, op. cit.*, 168
 30. K. Y. Yin, *Economic Development in Taiwan: Record and Prosepects*, (Taipei: Industry of Free China, January, 1962) 20
 31. For an interesting discussion of the urban growth in Taiwan see Chen Cheng-siang, *The Urban Growth in Taiwan*, (Taipei: Industry of Free China, December 1962) 1~8
 32. See Chang Ching-yuan, *op. cit.*, *passim*.
 33. *Taiwan Statistical Data Book, op. cit.*, 5 adapted
 34. Data from unpublished materials of the Michigan Population Studies Center, Taichung.

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人口壓力管見

蕭克立

討論人口壓力及其他有關人口問題之主要困難，在於不可能將人口問題孤立，視人口問題為經濟學或社會學上之單獨問題。蓋人口之增加牽涉到某一文化之多方面，因此討論人口問題，應就廣泛之關係中着手，本文係就社會，歷史，經濟三方面，着眼討論人口壓力問題，希望根據此項基礎，討論臺灣之獨有人口問題，或得以單獨而研究之。

影響人口問題爭議之要素，係家庭計劃運動，此一家庭計劃之興起，受山額夫人 (Mrs. Margaret Sanger) 所著「婦女與新人種」(Woman and the New Race) 一本薄書影響最大，該書一九二〇年問世，三年當中，曾刊行六版之多，是書首創實施大規模節育計劃，山額夫人在她的書中曾詳細說明；為何人類社會需要實行節育計劃。

為了進一步了解節育計劃，如何才能適應於當前中國情況，本文第二部份討論中國大家庭制度之歷史淵源，儘管當春秋戰國時代，即有若干人倡議，藉增加人力，達到擴張領域目的，然而中國社會中大家庭制度之基本因素，是以土地問題為背景，肥沃的土壤及細放農業，就人工言之，兒童常被認為財富之一。由於中國土地肥沃又採用細放方法需用更多，故農村人口之增加常被視為財富增加。

最后談到關於經濟學術語，吾人為了獲得結果，在討論之先需要了解「人口過剩」與「人口壓力」兩術語之意義，在臺灣，顯而易見地，不論開發新生土地，或實施工業化，兩者之進行速度，均不足以調節本島當前人口之增加，因此著者認為臺灣目前確有人口過剩及人口壓力兩項難題。

本文最后部份提出減輕人口壓力之建議。