

## **Dr. A.T.W. Simeons Manuscript, “Pounds and Inches” Abstract Version**

Over fifty years ago, Dr. A.T.W. Simeons M.D., pioneered a revolutionary new approach to losing weight. The following is a shortened version of the program from Dr. Simeons M.D. manuscript Pounds and Inches of which a link to a free version is given below.

Everyone needs to read the entire version of this Manuscript for full understanding of Dr. Simeons diet with hCG.

### **FOREWORD - Introduction by Dr. Simeons**

This book discusses a new interpretation of the nature of obesity, and while it does not advocate yet another fancy slimming diet it does describe a method of treatment which has grown out of theoretical considerations based on clinical observation.

What I (Dr. Simeons) have to say is, in essence, the views distilled out of forty years of grappling with the fundamental problems of obesity, its causes, its symptoms, and its very nature.

### ***The Significance of Regular Meals***

In the early Neolithic times another change took place which may well account for the fact that today nearly all inherited dispositions sooner or later develop into manifest obesity. This change was the institution of regular meals. In pre-Neolithic times, man ate only when he was hungry and only as much as he required to still the pangs of hunger. Moreover, much of his food was raw and all of it was unrefined. He roasted his meat, but he did not boil it, as he had no pots, and what little he may have grubbed from the earth and picked from the trees.

The whole structure of man's omnivorous digestive tract is adjusted to the continual nibbling of tidbits and is not suited to occasional gorging. The institution of regular meals meant that man had to eat more than his body required at the moment of eating so as to tide him over until the next meal. Food rendered easily digestible suddenly flooded his body with nourishment of which he was in no need at the moment. Somehow, somewhere this surplus had to be stored.

### ***Three Kinds of Fat***

In the human body we can distinguish three kinds of fat. The first is the structural fat which fills the gaps between various organs, a sort of packing material. Structural fat also performs such important functions as bedding the kidneys in soft elastic tissue, protecting the coronary arteries and keeping the skin smooth and taut.

The second type of fat is a normal reserve of fuel upon which the body can freely draw when the nutritional income from the intestinal tract is insufficient to meet the demand. Such normal reserves are localized all over the body. Fat is a substance which packs the highest caloric value into the smallest space so that normal reserves of fuel for muscular activity and the maintenance of body temperature can be most economically stored in this form. Both these types of fat, structural and reserve, are normal, and even if the body stocks them to capacity this can never be called obesity. But there is a third type of fat which is entirely abnormal. It is the accumulation of such fat, and of such fat only, from which the overweight patient suffers. This abnormal fat is also a potential reserve of fuel, but unlike the normal reserves it is not available to the body in a nutritional emergency. It is, so to speak, locked away in a fixed deposit and is not kept in a current account, as are the normal reserves.

When an obese patient tries to reduce by starving himself, he will first lose his normal fat reserves. When these are exhausted he begins to burn up structural fat, and only as a last resort will the body yield its abnormal reserves, though by that time the patient usually feels so weak and hungry that the diet is abandoned. It is just for this reason that obese patients complain that when they diet they lose the wrong fat. The fat they have come to detest stays on and the fat they need to cover their bones gets less and less. And that is one of the most frustrating and depressing experiences a human being can have.

### ***The Diencephalon or Hypothalamus***

Buried deep down in the massive human brain there is a part which we have in common with all vertebrate animals the so-called diencephalon. It is a very primitive part of the brain and has in man been almost smothered by the huge masses of nervous tissue with which we think, reason, and voluntarily move our body. The diencephalon is the part from which the central nervous system controls all the automatic animal functions of the body, such as breathing, the heart beat, digestion, sleep, etc.

It was therefore not unreasonable to suppose that the complex operation of storing and issuing fuel to the body might also be controlled by the diencephalon. It has long been known that the content of sugar - another form of fuel - in the blood depends on a certain nervous center in the diencephalon. When this center is destroyed in laboratory animals, they develop a condition rather similar to human diabetes. It has also long been known that the destruction of another diencephalic center produces a voracious appetite and a rapid gain in weight in animals which never get fat spontaneously.

***The Fat- bank***

Assuming that in man such a center controlling the movement of fat does exist, its function would have to be much like that of a bank. When the body assimilates from the intestinal tract more fuel than it needs at the moment, this surplus is deposited in what may be compared with a current account. Out of this account it can always be withdrawn as required. All normal fat reserves are in such a current account, and it is probable that a diencephalic center manages the deposits and withdrawals.

When now, for reasons which will be discussed later, the deposits grow rapidly while small withdrawals become more frequent, a point may be reached which goes beyond the diencephalon's banking capacity. Just as a banker might suggest to a wealthy client that instead of accumulating a large and unmanageable current account he should invest his surplus capital, the body appears to establish a fixed deposit into which all surplus funds go but from which they can no longer be withdrawn by the procedure used in a current account. In this way the diencephalic "fat-bank" frees itself from all work which goes beyond its normal banking capacity. The onset of obesity dates from the moment the diencephalon adopts this labor-saving ruse. Once a fixed deposit has been established the normal fat reserves are held at a minimum, while every available surplus is locked away in the fixed deposit and is therefore taken out of normal circulation.

***Pregnancy and Obesity***

Once this trail was opened, further observations seemed to fall into line. It is well known that during pregnancy an obese woman can very easily lose weight. She can drastically reduce her diet without feeling hunger or discomfort and lose weight without in any way harming the child in her womb.

Pregnancy is an obese woman's one great chance to reduce her excess weight. That she so rarely makes use of this opportunity is due to the erroneous notion, usually fostered by her elder relations, that she now has "two mouths to feed" and must "keep up her strength for the coming event. All modern obstetricians know that this is nonsense and that the more superfluous fat is lost the less difficult will be the confinement, though some still hesitate to prescribe a diet sufficiently low in calories to bring about a drastic reduction.

A woman may gain weight during pregnancy, but she never becomes obese in the strict sense of the word. Under the influence of the hCG which circulates in enormous quantities in her body during pregnancy, her diencephalic banking capacity seems to be unlimited, and abnormal fixed deposits are never formed. At confinement she is suddenly deprived of hCG, and her diencephalic fat-center reverts to its normal capacity. It is only then that the abnormally accumulated fat is locked away again in a fixed deposit. From that moment on she is again suffering from obesity and is subject to all its consequences.

Pregnancy seems to be the only normal human condition in which the diencephalic fat banking capacity is unlimited. It is only during pregnancy that fixed fat deposits can be transferred back into the normal current account and freely drawn upon to make up for any nutritional deficit. During pregnancy, every ounce of reserve fat is placed at the disposal of the growing fetus. Were this not so, an obese woman, whose normal reserves are already depleted, would have the greatest difficulties in bringing her pregnancy to full term. There is considerable evidence to suggest that it is the hCG produced in large quantities in the placenta which brings about this diencephalic change.

Though we may be able to increase the diencephalic fat banking capacity by injecting hCG, this does not in itself affect the weight, just as transferring monetary funds from a fixed deposit into a current account does not make a man any poorer; to become poorer it is also necessary that he freely spends the money which thus becomes available. In pregnancy the needs of the growing embryo take care of this to some extent, but in the treatment of obesity there is no embryo, and so a very severe dietary restriction must take its place for the duration of treatment.

Only when the fat which is in transit under the effect of hCG is actually consumed can more fat be withdrawn from the fixed deposits. In pregnancy it would be most undesirable if the fetus were offered ample food only when there is a high influx from the intestinal tract. Ideal nutritional conditions for the fetus can only be achieved when the mother's blood is continually saturated with food, regardless of whether she eats or not, as otherwise a period of starvation might hamper the steady growth of the embryo. It seems that hCG brings about this continual saturation of the blood, which is the reason why obese patients under treatment with hCG never feel hungry in spite of their drastically reduced food intake.

***hCG no Sex Hormone***

It cannot be sufficiently emphasized that hCG is not sex-hormone, that its action is identical in men, women, children and in those cases in which the sex-glands no longer function owing to old age or their surgical removal. The only sexual change it can bring about after puberty is an improvement of a pre-existing deficiency. But never stimulation beyond the normal. In an indirect way via the anterior pituitary, hCG regulates menstruation and facilitates conception, but it never virilizes a woman or feminizes a man. I (Dr. Simeons) have stressed this point only for the sake of my lay readers, because, it is our daily experience that when patients hear the word hormone they immediately jump to the conclusion that this must have something to do with the sex- sphere.

### ***Importance and Potency of hCG***

Owing to the fact that hCG has no direct action on any endocrine gland, its enormous importance in pregnancy has been overlooked and its potency underestimated. Though a pregnant woman can produce as much as one million units per day, we find that the injection of only 125 units per day is ample to reduce weight at the rate of roughly one pound per day, even in a colossus weighing 400 pounds, when associated with a 500-calorie diet. It is no exaggeration to say that the flooding of the female body with hCG is by far the most spectacular hormonal event in pregnancy. It has an enormous protective importance for mother and child, and I even go so far as to say that no woman, and certainly not an obese one, could carry her pregnancy to term without it.

### ***The Duration of Treatment***

Patients who need to lose 15 pounds (7 kg.) or less require 26 days treatment with 23 daily injections. The extra three days are needed because all patients must continue the 500-calorie diet for three days after the last injection. This is a very essential part of the treatment, because if they start eating normally as long as there is even a trace of hCG in their body they put on weight alarmingly at the end of the treatment. After three days when all the hCG has been eliminated this does not happen, because the blood is then no longer saturated with food and can thus accommodate an extra influx from the intestines without increasing its volume by retaining water.

When a patient has more than 15 pounds to lose the treatment takes longer but the maximum we give in a single course is 40 injections, nor do we as a rule allow patients to lose more than 34 lbs. (15 Kg.) at a time. The treatment is stopped when either 34 lbs. have been lost or 40 injections have been given. The only exception we make is in the case of grotesquely obese patients who may be allowed to lose an additional 5-6 lbs. if this occurs before the 40 injections are up.

### ***Immunity to hCG***

The reason for limiting a course to 40 injections is that by then some patients may begin to show signs of hCG immunity. Though this phenomenon is well known, we cannot as yet define the underlying mechanism. Maybe after a certain length of time the body learns to break down and eliminate hCG very rapidly, or possibly prolonged treatment leads to some sort of counter-regulation which annuls the diencephalic effect.

After 40 daily injections it takes about six weeks before this so called immunity is lost and hCG again becomes fully effective. Usually after about 40 injections patients may feel the onset of immunity as hunger which was previously absent. In those comparatively rare cases in which signs of immunity develop before the full course of 40 injections has been completed-say at the 35th injection treatment will be stopped.

Patients who need only 23 injections may be injected daily, including Sundays, as they never develop immunity. In those that take 40 injections the onset of immunity can be delayed if they are given only six injections a week, leaving out Sundays or any other day they choose, provided that it is always the same day. On the days on which they do not receive the injections they usually feel a slight sensation of hunger. At first we thought that this might be purely psychological, but we found that when normal saline is injected without the patient's knowledge the same phenomenon occurs.

### ***Menstruation***

During menstruation no injections are given, but the diet is continued and causes no hardship; yet as soon as the menstruation is over, the patients become extremely hungry unless the injections are resumed at once. It is very impressive to see the suffering of a woman who has continued her diet for a day or two beyond the end of the period without coming for her injection and then to hear the next day that all hunger ceased within a few hours after the injection and to see her once again content, florid and cheerful. While on the question of menstruation it must be added that in teenage girls the period may in some rare cases be delayed and exceptionally stop altogether. If then later this is artificially induced some weight may be regained.

### ***Further Courses***

Patients requiring the loss of more than 34 lbs. must have a second or even more courses. A second course can be started after an interval of not less than six weeks, though the pause can be more than six weeks. When a third, fourth or even fifth course is necessary, the interval between courses should be made progressively longer.

During the course of treatment the diet plan must be followed exactly.

If more than one course is needed and requested then between courses the patient gets no treatment and is free to eat anything he pleases except starches and sugar during the first 3 weeks. It is impressed upon him that he will have to follow the prescribed diet to the letter and that after the first three days this will cost him no effort, as he will feel no hunger and may indeed have difficulty in

getting down the 500 Calories which he will be given. If these conditions are not acceptable the case is refused, as any compromise or half measure is bound to prove utterly disappointing and is a waste of time and energy. Only when agreement is reached on the points so far discussed do we proceed with the examination of the individual.

### ***Gain before Loss***

Patients must eat to capacity for at least two days before starting treatment, regardless of how much weight they may gain in the process. One cannot keep a person comfortably on 500 Calories unless his normal fat reserves are reasonably well stocked. **It is for this reason also that every case, even those that are actually gaining must eat to capacity of the most fattening food they can get down until they have had the third injection.** It is a fundamental mistake to put a patient on 500 Calories as soon as the injections are started, as it seems to take about three injections before abnormally deposited fat begins to circulate and thus become available.

We distinguish between the first three injections, which we call "non-effective" as far as the loss of weight is concerned, and the subsequent injections given while the patient is dieting, which we call "effective".

The average loss of weight is calculated on the number of effective injections and from the weight reached on the day of the third injection which may be well above what it was two days earlier when the first injection was given.

Most people who have been struggling with diets for years and know how rapidly they gain if they let themselves go are very hard to convince of the absolute necessity of gorging for at least two days, and yet this must be insisted upon categorically if the further course of treatment is to run smoothly.

### ***Starting treatment***

In menstruating women, the best time to start treatment is immediately after a period. Treatment may also be started later, but it is advisable to have at least ten days in hand before the onset of the next period. Similarly, the end of a course should never be made to coincide with onset of menstruation. If things should happen to work out that way, it is better to give the last injection three days before the expected date of the menses so that a normal diet can be resumed at onset. Alternatively, at least three injections should be given after the period, followed by the usual three days of dieting. This rule need not be observed in such patients who have reached their normal weight before the end of treatment and are already on a higher caloric diet.

Those who require more than the minimum of 23 injections and who therefore skip one day a week in order to postpone immunity to hCG cannot have their third injections on the day before the interval. Thus if it is decided to skip Sundays, the treatment can be started on any day of the week except Thursdays. Supposing they start on Thursday, they will have their third injection on Saturday, which is also the day on which they start their 500 Calorie diet. They would then base no injection on the second day of dieting; this exposes them to an unnecessary hardship, as without the injection they will feel particularly hungry.

### **Typical Plan of a Normal Course**

#### **Phase One:**

Day 1: Take HCG and gorge on as much fatty foods as possible.

Day 2: Take HCG and continue gorging.

Day 3: Take HCG and follow the 500 calorie diet outlined in the Pounds and Inches Protocol.

#### **Phase Two:**

For the next 3 weeks NO Sugars or Starch (careful with very sweet fruit). If you gain more than 2 lbs over what weight you were the day you stopped taking HCG do a steak day (pg. 46 Pounds and Inches).

#### **Phase Three: Going back to Normal Eating;**

After 3 weeks, very gradually add starch in small quantities, always controlled by morning weighing. If you gain more than 2 lbs over the day you stopped taking HCG do a steak day (pg 46 Pounds and Inches). You should stabilize at the end of Phase 3. Continue to weigh daily for life and continue your new good eating habits.\*

**\*NOTE:** In phase 2 and 3 your weight will be more volatile and fluctuate in the beginning of the phase than at the end. These phases are critical for maintaining your weight loss long term. Once you are stable, if you need to lose additional weight, return to Phase 2 and do another round increasing Phase three by 2 or more weeks each additional round!

**The Original hCG Diet by Dr. A.T.W. Simeons;**

<b>Breakfast:</b>	Tea or coffee in any quantity without sugar. Only one tablespoonful of milk allowed in 24 hours. Saccharin or Stevia may be used.
<b>Lunch:</b>	<ol style="list-style-type: none"> <li>1. 100 grams of veal, beef, chicken breast, fresh white fish, lobster, crab, or shrimp. All visible fat must be carefully removed before cooking, and the meat must be weighed raw. It must be boiled or grilled without additional fat. Salmon, eel, tuna, herring, dried or pickled fish are not allowed. The chicken breast must be removed from the bird.</li> <li>2. One type of vegetable only to be chosen from the following: spinach, chard, chicory, beet-greens, green salad, tomatoes, celery, fennel, onions, red radishes, cucumbers, asparagus, cabbage.</li> <li>3. One breadstick (grissino) or one Melba toast.</li> <li>4. An apple, orange, or a handful of strawberries or one-half grapefruit.</li> </ol>
<b>Dinner :</b>	The same four choices as lunch (above.)

**To help with calorie counting;**

<http://www.thecaloriecounter.com/>

The juice of one lemon daily is allowed for all purposes.

Salt, pepper, vinegar, mustard powder, garlic, sweet basil, parsley, thyme, majoram, etc., may be used for seasoning, but no oil, butter or dressing.

Tea, coffee, plain water, or mineral water are the only drinks allowed, but they may be taken in any quantity and at all times. In fact it is recommended that you drink ½ your body weight in ounces of water.

The fruit or the breadstick may be eaten between meals instead of with lunch or dinner, but not more than four items listed for lunch and dinner may be eaten at one meal.

No variations other than those listed may be introduced.

All things not listed are forbidden, and the patient is assured that nothing permissible has been left out.

The 100 grams of meat must be scrupulously weighed raw after all visible fat has been removed. Those not uncommon patients who feel that even so little food is too much for them, can omit anything they wish.

There is no objection to breaking up the two meals. For instance having a breadstick and an apple for breakfast or before going to bed, provided they are deducted from the regular meals.

The whole daily ration of two breadsticks or two fruits may not be eaten at the same time, nor can any item saved from the previous day be added on the following day.

In the beginning patients are advised to check every meal against their diet sheet before starting to eat and not to rely on their memory.

Two small apples are not an acceptable exchange for "1 apple."

Some people do not realize that chicken breast does not mean the breast of any other fowl, nor does it mean a wing or drumstick.

The diet used in conjunction with hCG must not exceed 500 calories per day.

There are a number of foods, particularly fruits and vegetables, which have the same or even lower caloric values than those listed as permissible, and yet we find that they interfere with the regular loss of weight under hCG, presumably owing to the nature of their composition. Pimiento peppers, okra, artichokes and pears are examples of this.

While this diet works satisfactorily in Italy, certain modifications have to be made in other countries. For instance, American beef has almost double the caloric value of South Italian beef, which is not marbled with fat. This marbling is impossible to remove. In America, therefore, low-grade veal should be used for one meal and fish (excluding all those species such as herring, mackerel, tuna, salmon, eel, etc., which have a high fat content, and all dried, smoked or pickled fish), chicken breast, lobster, crawfish, prawns or shrimp, crabmeat or kidneys for the other meal.

Very occasionally we allow egg - boiled, poached or raw - to patients who develop an aversion to meat, but in this case they must add the white of three eggs to the one they eat whole. 100 grams of Cottage cheese made from skimmed milk may occasionally be used instead of the meat.

**Faulty Dieting**

Few patients will take one's word for it that the slightest deviation from the diet has under hCG disastrous results as far as the weight is concerned. This extreme sensitivity has the advantage that the smallest error is immediately detectable at the weighing but most patients have to make the experience before they will believe it.

Persons in certain positions who are obliged to attend social functions to which they cannot bring their meager meal must be told beforehand that an social dinner will cost them the loss of about three days treatment. They should take dainty servings of everything, bide what they can under the cutlery and book the gain which may take three days to get rid of. Allowing three days for their correction, such incidents do not jeopardize the treatment, provided they do not occur all too frequently in which case treatment should be postponed to a socially more peaceful season.

Sooner or later most people express a fear that they may be running out of vitamins or that the restricted diet may make them anemic. On this score the physician can confidently relieve their apprehension by explaining that every time they lose a pound of fatty tissue, which they do almost daily, only the actual fat is burned up; all the vitamins, the proteins, the blood, and the minerals which this tissue contains in abundance are fed back into the body.

### **The First Days of Treatment**

Many patients notice that they are passing more urine and that any swelling in their ankles is less even before they start dieting. On the day of the fourth injection most patients declare that they are feeling fine. They have usually lost two pounds or more, some say they feel a bit empty but hasten to explain that this does not amount to hunger. Some complain of a mild headache of which they have been forewarned and for which they have been given permission to take aspirin.

During the second and third day of dieting these minor complaints improve while the weight continues to drop at about double the usually overall average of almost one pound per day, so that a moderately severe case may by the fourth day of dieting have lost as much as 8- 10 lbs.

It is usually at this point that a difference appears between those patients who have literally eaten to capacity during the first two days of treatment and those who have not. The former feel remarkably well; they have no hunger, nor do they feel tempted when others eat normally at the same table.

They feel lighter, more clear-headed and notice a desire to move quite contrary to their previous lethargy. Those who have disregarded the advice to eat to capacity continue to have minor discomforts and do not have the same euphoric sense of self-being until about a week later. It seems that their normal fat reserves require that much more time before they are fully stocked.

### **Fluctuations in weight loss**

After the fourth or fifth day of dieting the daily loss of weight begins to decrease to one pound or somewhat less per day, and there is a smaller urinary output. There may be no drop at all for two or three days and then a sudden loss which reestablishes the normal average. These fluctuations are entirely due to variations in the retention and elimination of water, which are more marked in women than in men.

Fat is being extracted from the cells, in which it is stored in the fatty tissue. When these cells are empty and therefore serve no purpose, the body breaks down the cellular structure and absorbs it, but breaking up of useless cells, connective tissue, blood vessels, etc., may lag behind the process of fat-extraction. When this happens the body appears to replace some of the extracted fat with water which is retained for this purpose. As water is heavier than fat the scales may show no loss of weight, although sufficient fat has actually been consumed to make up for the deficit in the 500-Calorie diet. When such tissue is finally broken down, the water is liberated and there is a flow of urine and a marked loss of weight.

### **Interruptions of Weight Loss**

We distinguish four types of interruption in the regular daily loss. The first is the one that has already been mentioned in which the weight stays stationary for a day or two, and this occurs, particularly towards the end of a course, in almost every case.

### **The Plateau**

The second type of interruption we call a "plateau". A plateau lasts 4-6 days and frequently occurs during the second half of a full course, particularly in patients that have been doing well and whose overall average of nearly a pound per effective injection has been maintained. Those who are losing more than the average all have a plateau sooner or later. A plateau always corrects itself but many patients who have become accustomed to a regular daily loss get unnecessarily worried. No amount of explanation convinces them that a plateau does not mean that they are no longer responding normally to treatment.

In such cases we consider it permissible, for purely psychological reasons, to break up the plateau. This can be done in two ways. One is a so-called "apple day". An apple-day begins at lunch and continues until just before lunch of the following day. The patients are allowed six large apples and are told to eat one whenever they feel the desire though six apples is the maximum allowed. During an apple-day no other food or liquids except plain water are allowed and of water they may only drink just enough to quench an uncomfortable thirst if eating an apple still leaves them thirsty. Most patients feel no need for water and are quite happy with their

six apples. Needless to say, an apple day may never be given on the day on which there is no injection. The apple-day produces a gratifying loss of weight on the following day, chiefly due to the elimination of water. This water is not regained when the patients resume their normal 500-calorie diet at lunch, and on the following days they continue to lose weight satisfactorily. It is useless to give either an apple-day or a diuretic unless the weight has been stationary for at least four days without any dietary error having been committed.

### **Reaching a Former Level**

The third type of interruption in the regular loss of weight may last much longer - ten days to two weeks. Fortunately, it is rare and only occurs in very advanced cases, and then hardly ever during the first course of treatment. It is seen only in those patients who during some period of their lives have maintained a certain fixed degree of obesity for ten years or more and have then at some time rapidly increased beyond that weight. When then in the course of treatment the former level is reached, it may take two weeks of no loss, in spite of hCG and diet, before further reduction is normally resumed.

### **Menstrual Interruption**

The fourth type of interruption is the one which often occurs a few days before and during the menstrual period and in some women at the time of ovulation. It must also be mentioned that when a woman becomes pregnant during treatment - and this is by no means uncommon - she at once ceases to lose weight. An unexplained arrest of reduction has on several occasions raised our suspicion before the first period was missed. If in such cases, menstruation is delayed, we stop injecting and have a pregnancy test five days later. No pregnancy test should be carried out earlier than five days after the last injection, as otherwise the hCG may give a false positive result.

Oral contraceptives may be used during treatment.

### **Dietary Errors**

Any interruption of the normal loss of weight which does not fit perfectly into one of those categories is always due to some possibly very minor dietary error. Similarly, any gain of more than 100 grams is invariably the result of some transgression or mistake, unless it happens on or about the day of ovulation or during the three days preceding the onset of menstruation, in which case it is ignored. In all other cases the reason for the gain must be established.

The patient who frankly admits that he has stepped out of his regimen when told that something has gone wrong is no problem. He is always surprised at being found out, because unless he has seen this himself he will not believe that a salted almond, a couple of potato chips, a glass of tomato juice or an extra orange will bring about a definite increase in his weight on the following day. Very often he wants to know why extra food weighing one ounce should increase his weight by six ounces. We explain this in the following way: Under the influence of hCG the blood is saturated with food and the blood volume has adapted itself so that it can only just accommodate the 500 calories which come in from the intestinal tract in the course of the day. Any additional income, however little this may be, cannot be accommodated and the blood is therefore forced to increase its volume sufficiently to hold the extra food, which it can only do in a very diluted form. Thus it is not the weight of what is eaten that plays the determining role but rather the amount of water which the body must retain to accommodate this food.

This can be illustrated by mentioning the case of salt. In order to hold one teaspoonful of salt the body requires one liter of water, as it cannot accommodate salt in any higher concentration. Thus, if a person eats one teaspoonful of salt his weight will go up by more than two pounds as soon as this salt is absorbed from his intestine.

To this explanation many patients reply: Well, if I put on that much every time I eat a little extra, how can I hold my weight after the treatment? It must therefore be made clear that this only happens as long as they are under hCG. When treatment is over, the blood is no longer saturated and can easily accommodate extra food without having to increase its volume.

### **Other Reasons for a Gain**

Apart from diet and cosmetics there can be a few other reasons for a small rise in weight. Some patients unwittingly take chewing gum, throat pastilles, vitamin pills, cough syrups etc., without realizing that the sugar or fats they contain may interfere with a regular loss of weight. Sex hormones or cortisone in its various modern forms must be avoided, though oral contraceptives are permitted. In fact the only self-medication we allow is aspirin for a headache, though headaches almost invariably disappear after a week of treatment, particularly if of the migraine type.