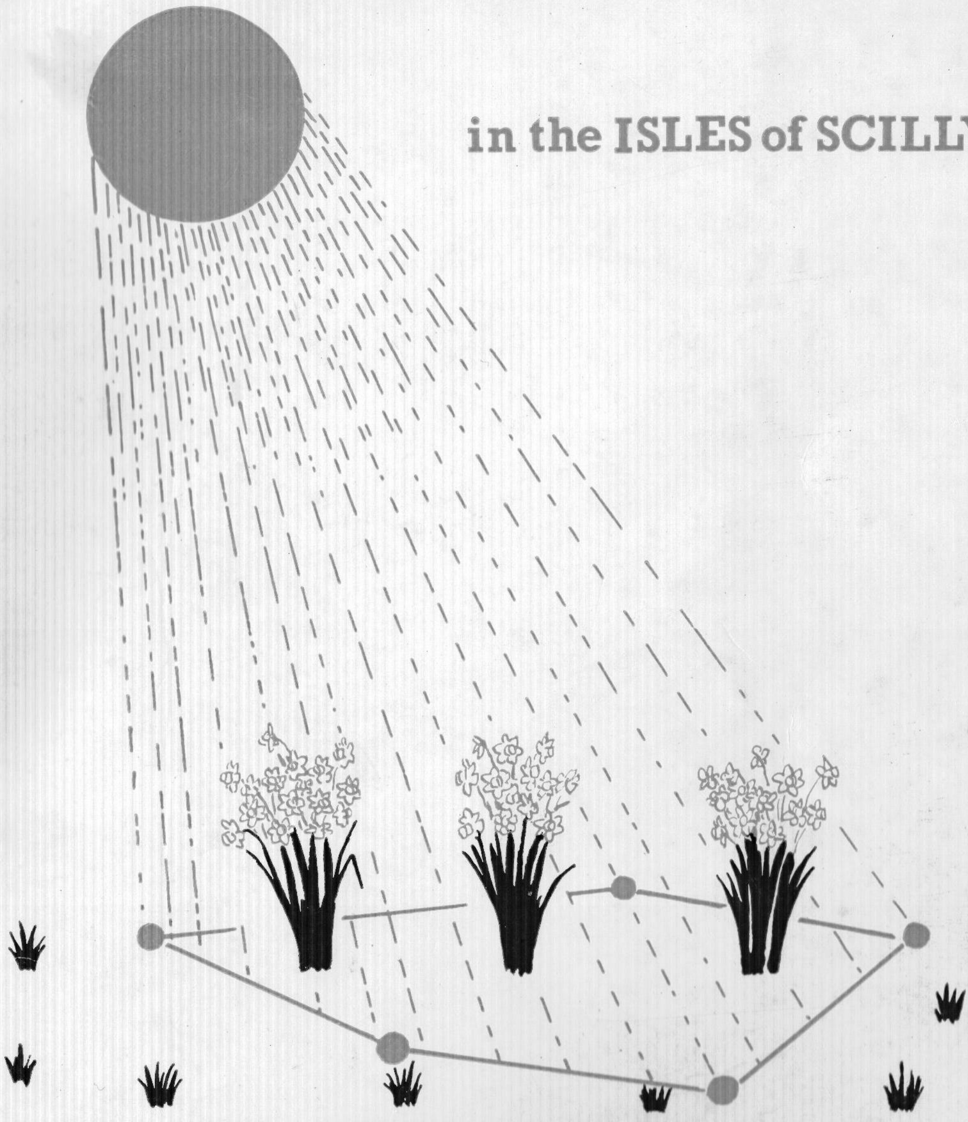
SOLAR ENERGY & DOWSING



in the ISLES of SCILLY

FOR GARDENERS & FARMERS

By A. P. TABRAHAM

SOLAR ENERGY AND DOWSING IN THE ISLES OF SCILLY

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This is a true story of research into the early flowering of Soleil d'or narcissus bulbs, which leads to a greater understanding of dowsing and on to a quite unknown source of solar energy.

This energy can be used by all, to increase the ground temperature, the growth rate of crops, the temperature of houses, in fact increase the temperature in anything in which this force has been induced, and may well prove to be of benefit to mankind.

All the temperature rises given are supported by daily records taken by hand and thermograph over the last three years, and are available for inspection.

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INTRODUCTION

The first chapters are about research into the early flowering of narcissus Soleil d'or, and how and why it was produced. This research led to a step by step understanding of what causes the dowsing effect, which had been known about and used from the earliest times for the detection of underground water before wells were dug, and in more recent times for the tracing of water pipes. These two investigations are so interwoven that they must be described together. The later Chapters lead on to temperature rises and solar energy.

THE SOLEIL d'OR STORY

This research started from the known fact that Soleil d'or had, for the last fifty years or more, been grown as a commercial crop in the Isles of Scilly; it had become the main source of income for the Scillonian farmers and, in order to catch the early market for flowers, which made high prices before or at the Christmas period, it was regular practice to burn over the fields while the bulbs were dormant in the ground, at or about midsummer's day. To do this the farmers spread straw loosely over the fields to a depth of approximately six inches, by spreading six tons to the acre during a dry spell of weather at midsummer and setting fire to it against the wind, so that the flame moved slowly across the field.

This treatment brought the bulbs through the ground up to 2–3 weeks earlier than bulbs not so treated and these burnt over bulbs flowered before the Christmas period, thus obtaining high prices, whereas the untreated bulbs normally flowered in late January or early February.

This practice had become traditional and it was not known how it originated; but it is assumed that earlier farmers had observed that, where they had burnt rubbish on the fields of bulbs during the summer, the bulbs flowered earlier in these areas the following winter.

Many theories have been advanced as to why this happened, but none have survived investigation. That residual ash contained potash was one theory; but the same results were not obtained by applying potash fertilizer. Another was that the ash left by the straw which blackened the ground over the bulbs, would increase the absorption of sun heat. While this is probably true to some extent the extra heat was of short duration and could not be the cause. Another theory was that moisture was drawn up by the heat of the fire which started the bulbs growing, and this may to a certain degree be true; but it would not in itself be enough to produce early flowering.

As long as the production of straw or its importation into the islands was cheap and the spreading of the straw, which was labour intensive, was also comparatively cheap, as wages were low, the entire process was economicably viable, and high prices were obtained for the Soleil d'or due to the shortage of most flowers over the Christmas period. With the development of the glasshouse industry and the need for crops to follow the tomatoes in the winter period, the competition in early flowers became greater. So the price of Soleil d'or fell, as the cost of production rose, with higher wages, increased rents, and higher charges for freight and fuel for the tractors, whereas in the earlier years horses were used, which could be fed off the land.

The result was that the burning-over of the Soleil d'or with straw was becoming uneconomical and slowly the practice declined, and equally slowly the Soleil d'or became later and later until most of the crop did not flower until the end of January and early February.

Accordingly the Soleil d'or at this time had to compete in the market with all the other narcissus both from Scilly and Cornwall and, as a result, did not obtain such high prices. This in turn led to a further decline in the areas of Soleil d'or grown and the farmers instead grew larger areas of daffodils etc. in order to remain in business; they also increased the areas of early potatoes and were looking for alternative crops.

There was a decline in the income of farmers generally at that time. The Shipping companies' records show that the despatch of flowers before Christmas declined over this period from up to two thousand boxes of flowers to as little as two hundred, indicating very clearly the reduced early flowering as a result of farmers not burning-over the Soleil d'or.

FIRST STEPS TO FIND OUT WHY

It was at this time, in 1968, that experiments were set up to try and find the cause for the general lateness of flowering of the Soleil d'or, which had over the last fifty years flowered just before or around the Christmas period, but were now for no apparent reason flowering in late January and early February. The burning-over of the Soleil d'or had only advanced the flowering by two to three weeks at the most, and had been more or less discontinued for seven to eight years. This was not associated with the increased lateness of flowering of the Soleil d'or, and it was in fact assumed that this had occurred because the weather conditions had altered.

As the Soleil d'or originated in the Mediterranean region and was thought to be heat responsive, the first experiments were based on this, and the bulbs were lifted during May and given various warm storage treatments ranging from 28 days at 80°F to 9 days at 90°F in specially constructed warm cabinets.

The bulbs were replanted immediately, and responded well. Flowering in early December after warm storage in May; but in the following year they flowered if anything later than the untreated bulbs. This method was very labour-intensive, and was not really economic owing to the fact that the bulbs had to be lifted, warm stored, and replanted; and moreover only the larger bulbs flowered, resulting in a quite small if high-priced crop, which was not sufficent to cover the cost in the one year, with no carry over into the next year.

The second method was to cover the growing bulbs with polythene sheeting and use the sun to heat the bulbs in the ground. To do this the foliage was cut down in mid-May and the area covered with polythene sheeting for 6–8 weeks. This proved to be successful and produced flowers from the middle of November in the year they were treated. This method looked promising as the labour costs were comparatively low, the polythene sheeting could be of a reasonably cheap grade, and it was possible to cover an established crop of bulbs with a high flower potential and get a good return for the cost of the labour and material involved. The problem with this method was that in the following year the resulting crop of flowers was low and the bulbs required up to two years to recover from this treatment. So again this method was not really economic, as the one year's high-priced crop had to subsidise two poor years after. This could to a certain extent be accepted by the larger farmers with plenty of bulbs and acres; the small farmers could not afford this treatment.

It was at this time that it was decided to look again at the old burning-over process which had served the flower industry well for a great many years. But how could the cost be reduced to make it economical?

As has already been shown from the partial success of the last two methods, early flowering was connected with heat. Tests were therefore carried out with straw and it was found that no heat from the burning-over reached the bulbs 2–3 inches below the surface. So how did the straw-burning work? Various theories had been put forward over the years and tested, but none had stood up.

NEW FLAMES FOR OLD

It was decided to repeat as far as possible the movement of the flame as in straw-burning, and to use instead of straw a tractor-mounted propane burner with ten powerful gas jets, which would create a wall of flame moving at approximately the speed of straw-burning flame. In practice this was determined by the minimum rate of the tractor in the lowest reduction gear, which is approximately one third of a mile an hour.

This created a flash burn of about 1000° for a very short time which heated the surface of the ground, but did not raise the ground temperature at bulb level in any way. It was possible to put a hand on the ground three feet behind the tractor and and the ground felt warm but not uncomfortably hot.

This treatment was carried out as a comparison with traditional straw-burning at four dates, 1st & 15th June and 1st & 15th July, to cover completely the traditional time for burning, near the longest day. The areas burnt and all other factors were as equal as it was possible to make them. The results were assessed by the flowering dates obtained by the various treatments. These proved to be the same for straw-burning as for propane-burning when the plot was burnt at the same date. The most successful dates proved to be the 15th June and the 1st of July, showing that the traditional dates used over the years were the best. As there were no residual ash, chemicals or blackening of the ground with the propane-burning which gave the same results as with straw-burning, it was proved that the old theories involving them were incorrect.

As the straw-burning left an ash deposit it was easy to see the bounds of each experimental plot; but as the propane-burning left very little visual trace it was more difficult to do so. It was, however, noticed that where two propane burnings at different dates joined each other and overlapped, giving two burnings at different dates over very small areas, the bulbs here flowered 7 to 10 days earlier than all the others in the main areas of the experimental plots. From this it was deduced that additional burning would result in earlier flowering.

The following year this was put to the test. One plot was burnt over with propane three times, one after another, on the same day; other plots were burnt one, two, and three times at 14-day intervals. This experiment was not practical with straw owing to the cost. The results were most interesting. The plot burnt over three times one after another on the same day produced no additional earliness when compared with the plot burnt only once. The plots burnt-over two and three times at 14-day intervals showed a marked effect: one burn advanced the flowering date by approximately 2 weeks, similar to traditional straw-burning; two burns at 14-day intervals advanced the flowering date by 3–4 weeks; and three burns at 14-day intervals advanced the flowering date by 4–5 weeks, bringing the flowering time to the mid-November to early-December period which had been traditional for fifty years.

This method was a success: it was comparatively cheap (approximately a quarter of the cost of straw-burning), simple to carry out, required the minimum of labour, and was independent of the weather, with a further bonus that it cleaned off all the weeds, trash, etc. As far as the farmers were concerned this was the answer to their problems. It was now known how to produce early flowers, but it was still not known why it happened. This remained as complete a mystery as it had always been.

These results were obtained on small experimental plots and all cultivations and treatments were by hand. But when the farmers started to use these methods, which they were quick to do, there were some puzzling variations. Some obtained exactly the same results as on the experimental plots; but others who carried out all the treatments correctly, failed to achieve the same results, and for no apparent reason. So there was another problem to be solved: what were some of the farmers doing differently to obtain results other than those on the experimental plots?

FATE, LUCK, GOD OR THE DEVIL?

This was the point at which Fate, Luck, God or the Devil decided to take a hand. It had been observed for many years that where large outcrops of granite projected through the surface of the bulb fields, the Soleil d'or planted immediately round them always flowered earlier than other bulbs in the area. In a television programme on dowsing it was mentioned that all large standing stones, such as Stonehenge, or well-known stone circles have strong dowsing effects in them. So it seemed possible that there might be a connection between these stones in the bulb fields and what was being achieved with the burning-over. Accordingly all the experimental plots were tested with a pair of dowsing rods. But as all the plots had been burnt-over in June and July, and it was now January of the following year, no results were expected. It was therefore with some amazement that it was found possible to detect all the burnt-over areas to the inch, the dowsing rods closing over the areas and opening again when out of them. It was also found that areas burnt-over two years earlier from which the bulbs had been removed could be detected with the dowsing rods, even though these areas were now grassed over so that no boundaries were vislble. This indicated that the burning-over had a long-lasting effect and was not, as was thought a treatment effective for one year.

It also indicated that we were not only treating the bulbs but the ground as well. This was the first indication of what the burning was doing; as our previous experiments had shown that Soleil d'or was heat responsive, we were looking for heat in some form. To investigate this further an experiment was set up to burn over ground in which no bulbs were growing.

Five areas 3ft. by 3ft. were marked out 2ft. apart and marked 1–5. Squares 1–4 were all burnt-over with a propane burner at the rate previously used, and a soil thermometer was set in square 1 three inches down to the level where bulbs are usually planted; a similar thermometer was set at the same depth in the soil in square 5, which was not burnt, to act as an untreated control. All five squares were checked with the dowsing rods and squares 1–4 showed a dowsing effect; square 5 gave no effect.

The thermometer in square 1, which had been burnt-over once, after 5 days showed an increase in day maximum temperature of up to 2°F when compared with square 5. As it was already proved that burning-over more than once advanced the flowering date, squares 2, 3 and 4 were burnt over again 14 days after the first burn. A soil thermometer was set in square 2 at the same depth as in square 1, and 5 days afterwards this thermometer was recording up to 4°F increase in day maximum temperature when compared with square 5. Squares 3 and 4 were burnt-over 14 days later, and a further 1–2°F increase in day maximum temperature was recorded by a thermometer set to the same depth as in square 3, making an increase of 5–6°F in the day maximum temperature in the three times burnt-over ground, with the maximum increase being obtained on sunny days and only 1–2°F on dull days (see chart 1, page 16). To try to find out what was happening to the ground, square 4 had one inch of the surface soil removed 1 hour after the first burning-over, and it was found that the dowsing effect had been removed with the soil; this soil was returned to the square, firmed down and again checked with the dowsing rods, but the effect was found to be gone.

This square was again checked with the dowsing rods 1 hour later and the effect had returned as strongly as before, indicating that the force had powers of recovery. The soil was again removed five days later, when it was found that 3–4 inches of top soil had to be removed before the dowsing effect could not be detected with the rods; on returning the soil the effect was temporarily lost, but returned as before in about 1 hour. After a further five days the soil had to be removed to a depth of 5–6 inches to lose the effect. This square was now due for another burning-over and, three days after this second burn, even with the removal of 12 inches of soil down to the rock and subsoil the dowsing effect was still there, indicating that the second burning-over had increased the dowsing effect to such a point that it was not possible to remove it by excavating the soil. It is interesting that the dowsing effect only moves down into the soil and not an inch sideways, though that this is not always so is shown later.

To check that the dowsing effect was part of the temperature rise, thermometers were set in the area which had been burnt-over two years earlier, and it was found that this ground still recorded up to 2°F rise in the day maximum temperature when compared with a similar area with no dowsing effect, indicating that the dowsing effect produced by the burning-over was long-lasting, and that it was connected with the temperature rise.

It was now found that the Soleil d'or bulbs themselves and their foliage are permeated with the dowsing effect; when a small quantity of bulb foliage was removed from bulbs growing in burnt-over ground, and placed on untreated ground and the dowsing rods held over them, a dowsing effect was obtained. This effect is also produced by a single bulb taken from burnt-over ground.

On lifting the bulbs from burnt-over ground, it was found that the bulbs themselves when lying on the surface of untreated ground gave a day maximum temperature rise of 5°F in continuous sunshine with correspondingly less on average days and 1–2°F on dull days, when compared with bulbs lifted from normal ground (see chart 2, page 17).

These last results indicate why the farmers, years ago, always had their Soleil d'or in flower before the Christmas period. As straw and labour were cheap, they burnt-over their land regularly, though generally only once a year; but as it is now known that the effect lasts over the one year by continually burning over their Soleil d'or each year, they could have large areas of land which had cumulatively 3–4 burning-over effects with a general rise in day maximum temperature of up to 6°F. As the effect was so long-lasting, the gradual loss of early flowering was not noticed and, indeed, was attributed to less favourable weather conditions. But it was in fact due to the reduction and finally to the virtual stopping of the burning-over, because of rising costs, with the slow loss of the dowsing-effect and the drop in soil temperature.

THE DOWSING EFFECT FLOWS THROUGH FERREOUS METAL AND WIRE

In the past it was always assumed that the burning-over effect was confined to the Soleil d'or and tazzetta bulbs, but once it was proved that the temperature in the ground had been raised it was obvious that other plants would benefit. Similar results were obtained when Dutch Iris were burnt-over. Winter broccoli, when planted in burnt-over ground, produces improved quality heads and is ready earlier.

It was found that Freesias could be successfully grown outside with the additional heat produced by burning-over, though the flowers in the bud stage could still be damaged by weather conditions, mainly hail, which marked the buds and made them unsaleable. In order to try to prevent this type of damage, two areas of Freesias were planted and burnt-over three times. Over one of the areas a galvanized tubular structure was erected in late December, with the intention of covering this framework with a fine mesh fabric to shelter the Freesias from hail, strong winds etc., when the flower buds started to show.

In early January, before the fabric was put on the structure, there was a period of light snowfall very unusual for the Scilly Isles, and the Freesias under the bare tubular structure were badly damaged, whereas the other identical area of Freesias next to it, but not covered by the tubular framework, was virtually undamaged. This was difficult to explain; but on checking both areas with the dowsing rods it was found that the ground and the Freesias under the tubular framework gave no dowsing effect, though the metal rods of the structure gave a strong one. The other area of Freesias still gave a strong dowsing effect.

This indicated two things: firstly, that the dowsing effect caused the temperature rise and so was able to protect plants during cold weather. Secondly, that the galvanized tubular structure had removed the dowsing effect from the ground and from the Freesias, and so caused the loss of the temperature rise in both. As this type of structure is only loosely connected by wire and a lot of it was not touching the ground, it seemed that the dowsing effect could flow through a wire. To check this, a section of galvanized tube was joined to the tubular structure with galvanized fencing wire, by winding the wire tightly round each end; this short length of pipe was supported clear of the ground on an adjacent structure. Alongside this short length of pipe a similar section of pipe was placed but not joined to the structure. One hour later both pipes were checked with the dowsing rods, when it was found that the pipe connected to the tubular structure by wire gave a strong dowsing effect; the other pipe not so joined gave none.

To test this further both ends of the two pipes were plugged, and into one end of each a thermometer was passed through the plugs to record the internal temperature. The response was immediate; on bright sunny days the temperature in the pipe with the dowsing effect recorded up to 4.5°F rise in day maximum temperature, when compared with the unconnected pipe lying alongside it and identical in every way (see chart 3, page 18).

To try and establish a flow rate, a further length of pipe was joined in the same way with 30 metres of galvanized wire and kept clear of the ground, and a dowsing effect was recorded in this pipe weakly at 24 hours after, but strongly after 30 hours. This pipe also recorded similar temperature rises. No flow was obtained when the pipe was joined with copper wire, which does not transmit the dowsing effect.

In order to check how far a ferreous metal object could remove the dowsing effect, an angle iron 6 feet long was driven 1 foot into three times burnt-over ground, and it was found that the angle iron removed the dowsing effect out to a radius of 6 feet, but could not remove it beyond this distance. The 12 feet diameter circle round the angle iron was burnt-over every day for 10 days, and after each burn the dowsing effect was removed by the iron in approximately 1 hour, but to not more than 6 feet radius from the angle iron.

A 6-inch iron nail was set in three times burnt-over ground, and it was able to remove the effect out to a 6 feet radius; but it was approximately 48 hours before the effect was taken up by the nail, indicating that the greater the mass of metal involved, the more rapidly the dowsing effect was removed. This explains why there were such variable results from the burning-over by various farmers; some after burning-over had reridged their bulbs with tractor mounted equipment and obtained no real effect from the burning-over, while others who did not do any cultivation after burning had excellent results. The tractor on its rubber tyres is insulated from the ground and provided no part of the equipment touches the ground it does not remove the dowsing effect; but if equipment such as a plough, ridger, or harrows is joined by the mounting linkage to the tractor, the combined mass of steel can be two to three tons and this instantaneously removes the dowsing effect. As the tractor moves regularly up and down the field, it removes the dowsing effect from the whole field.

This had been observed but not understood, as it was often the best and the tidest farmers who carried out the burning exactly as required who failed, whereas less tidy farmers got excellent results.

ALTERNATIVE METHODS OF PRODUCING THE DOWSING EFFECT

As it was becoming obvious that the dowsing effect was the cause of the temperature rise, and the regular use of the dowsing rods to find water had been used in the past, old books on dowsing were read to see if the past had anything to tell us. These books proved to be very interesting, though some of the claims as to what could be done or found with the dowsing rods was now felt to be a little difficult to accept. Two methods of creating a dowsing effect were written up in all the books. They had been used for long periods, not always with good intentions, and were associated with witchcraft.

The first method found was the mirror method. In this a length of iron rod, pipe or angle iron is driven into the ground deep enough for it to remain upright. When the sun is shining a mirror is held in the hands in such a way as to reflect the sunlight up and down the iron rod. This instantaneously produces a dowsing effect approximately 18 inches wide between the person and the rod, and behind the rod to the horizon and behind the person with the mirror to the horizon. It behaves rather like radar in that it will not go over the horizon. It will go to the top of a hill facing or behind the person holding the mirror, but it will not go over the hill; it passes through objects in its path and goes into the ground at the same rate as the dowsing effect produced by burning-over, and gives the same temperature rises, one flash with the mirror giving the same as one burning-over, three flashes equalling three burning-over.

This method, while being effective, was not of real use to the farmers as it was very difficult to control; but had no other method proved successful, it would have been developed and used.

The second method is so simple that it is difficult to believe in it. It is at present quite unexplained and rather like witchcraft. All that is required is to draw the outline of a five-sided figure, a Pentagon. It can be drawn with a pen on paper, a stick on the ground, or, just by marking five points on the ground to form the outline of a Pentagon while walking round a large field, the one essential thing is that the first point marked must be touched again to complete the Pentagon; if a gap of 2 inches is left no dowsing effect is produced. But provided the Pentagon is complete the dowsing effect is produced immediately; no matter how large or small the area enclosed by the Pentagon the dowsing effect is obtained over the entire area. Exactly the same rise is produced as in the burning-over; one Pentagon equals one burning-over and gives the same 2°F rise, two Pentagons 3–4°F rise, three Pentagons 5–6°F rise in bright sunny weather, though on duller days the rise is related to the amount of heat during the day.

This method of producing a dowsing effect is as or more effective in producing the temperature rise than the burning-over, and costs nothing. It has all the advantages: it is easy to produce, can be easily shaped to fit any area, and provided there are five sides its shape can vary greatly. This method from the farmers' point of view has everything to be said for it in use (see chart 4, page 19).

THE OLD AND THE NEW JOIN IN ONE

Why this had not been found out in the past is easily explained. The fact that Soleil d'or had responded to being burnt-over had been known for 50–60 years, but not understood. The rise in the cost of the process caused it to become uneconomical and so to be discontinued, with the result that the flowering came later. The search for the cause of the later flowering produced a number of facts which slowly merged into a very clear indication that the dowsing effect was the cause of the temperature rise.

The dowsers of earlier years did not know that the Soleil d'or in the Scilly Isles flowered earlier when burnt-over, and had no reason to, and would not, in all probability have been able to find this dowsing effect, as they used forked twigs which are less sensitive, they were moreover exclusively interested in the search for water, although they also claimed to be able to find many other things. Their earlier experiences with methods of producing the dowsing effect were never the less of considerable assistance in these experiments.

It was the chance bringing together of the old and the new in a television programme which enabled the earlier knowledge of dowsing to be linked with known fact that the flowering of the Soleil d'or could be advanced by burning-over. That these two streams of knowledge were brought together at the same time and used to solve a problem, resulted in our finding that the early flowering of the Soleil d'or, produced by the burning-over, created a dowsing effect in the bulbs and soil, which produced a temperature rise, and this ultimately led us back to the old dowsers and their knowledge of the Pentagon method of creating a dowsing effect which also produced the temperature rise.
This putting together of knowledge old and new also cleared up some of the mysteries of dowsing and how it works; but still leaves us with the question of why it works.

WATER AND THE DOWSING EFFECT

The next question is, why does water produce a dowsing effect, a fact that has been known and used for centuries. The answer is that it does not always do so; water collected as rain direct into a container with no contact with the earth does not produce a dowsing effect. This effect does not appear until the rainwater has passed through the ground and is collected in streams, wells etc., and ultimately in our water mains; then we are able to detect its presence under the ground with the dowsing rods, and in the past with forked sticks, still used by many today.
The source of the dowsing effect in the ground is the result of fires, however small or large. In ripening fruit, berries etc., nature uses the production of ethylene which produces the dowsing effect to increase the temperature of fruit and so brings about the ripening process. Water which strongly attracts the dowsing effect, leaches it out of the ground and concentrates what is a very weak effect into one strong enough to measure with the dowsing rods.

'ETHYLENE' NATURES DOWSING EFFECT

All fruit and berries produce ethylene to start the ripening process when the seeds are ready, as ethylene is natures dowsing effect, which in turn increase their absorption of heat, causing a rise in temperature bringing about the ripening process. Deprive the fruit of heat and you delay the process. This can easily be proved, take a bowl of tomatoes, bananas, apples, pears, which are unripe and compare with a bowl of ripe fruit. The ripe fruit will give a dowsing effect according to how ripe they are, the unripe fruit will give no effect.
Nature has used this force for her own ends since fruit was first ripened, to encourage animals to eat the fruit and so spread the seeds over a wide area, a lot of fruit is not eaten which helps to put a dowsing effect in the ground, one source of the dowsing effect in water.

NORTH–SOUTH LINE AND THE EARTH'S MAGNETIC FIELD

When the dowsing effect of ground treated by burning or the Pentagon is being measured, it will be found that, as the person with the rods rotates, the rods open (i.e. lie parallel) when he faces due east, and his hands are in a north–south line, close (i.e. cross) when he faces south, open again when he faces west and his hands are again in a north–south line, and close again as soon as he turns north. This north–south line is there at all times and suggests a possible connection with the earth's magnetic field.

A further indication of this north–south line is that all burnt-over or petagoned areas move south in the ground at approximately 6–9 feet per year. This movement mainly takes place when the ground is full of water in December and January.

In small areas with a dowsing effect in which recording of ground temperatures is taking place, the dowsing effect moves south, and the thermometers in the areas from which it has moved stop recording the temperature rise which they had originally shown. This gives a further indication that the dowsing effect produces the temperature rise, and also indicates clearly the north–south movement of this force.

This can also be shown if two ferreous metal objects, one of which has a dowsing effect, are placed on a bench with the one having the dowsing effect to the north of the other; the dowsing effect will move from the northern object to the southern, but if the two metal objects are reversed to bring the one now containing the dowsing effect to the north again, the dowsing effect will move again to the south and this can go on continually.

THE DOWSING EFFECT CAUSES THE TEMPERATURE RISE

Another positive link indicates without doubt that the dowsing effect is the cause of the temperature rise, and also demonstrates its north–south movement in wet conditions.

A thermograph with two probes, which had been used for twelve months to record the temperature in burnt-over ground compared with normal ground, was removed and taken into a shed for maintenance. While checking the two recording pens for accurate setting against another thermometer of known accuracy, it was noticed that the pen connected to the probe which had been in the burnt-over ground, which gave a strong dowsing effect, was recording a higher temperature when compared with the pen connected to the probe which had been in normal ground and gave no dowsing effect, and also with the checking thermometer.

This rise in temperature was traced to the electric fire which was on in the building, and it was only possible to check the pens accuracy by turning off this heat source, after which both pens and the checking thermometer all recorded the same temperature. The thermograph was run for a week with both pens and the checking thermometer recording the same temperature. To test this further the thermograph was set up outside with the two probes set 3 inches apart on top of a bench in full sun. Immediately the probe which had been in burnt-over ground, and which gave a strong dowsing effect, recorded increased temperatures during day light hours of up to 5°F maximum increase on sunny days, when compared to the other probe 3 inches away, which had been in normal ground and gave no dowsing effect.

By coincidence the probe with the dowsing effect was north of the other probe, and no knowledge of the southward movement of the dowsing effect was known at that time. A period of continuous heavy rain at this time maintained a film of water on the bench between the two probes for up to 12 hours, and it was noticed that the probe which had up to that time given a strong dowsing effect and had a higher temperature was now recording a lower temperature than the probe which had not hitherto given a dowsing effect. An immediate check with the dowsing rods indicated that the dowsing effect had moved from the north probe into the south probe, indicating that the dowsing effect through the medium of the water on the bench had taken the temperature rise from one probe to the other.

As the pens could not long remain in this position without the lower pen rising up and fouling the top pen, the probes were reversed by moving the north and placing it to the south of the other probe, and, as the weather was showery at the time, within 24 hours the pens were again recording as before, indicating that the dowsing effect had again moved from north to south, taking the temperature rise with it.

The thermograph was recording all the time and a complete record of this change-over was made. This proves that the dowsing effect moves from north to south and causes the temperature rise, and constitutes one more step in the understanding of it.

THE DOWSING EFFECT CREATES A FORCE FIELD TO ANY HEAT SOURCE

Anything in which the dowsing effect has been induced by the Pentagon method or by burning-over, whether it is water, plants, soil, or ferreous metal in any form, connects by a force field to any heat source. It is this force field that is measured by the dowsing rods and this causes them to cross; heat is conducted along this field increasing the temperature in the object which contains the dowsing effect.

In the case of objects, plants etc., which are outside and subject to radiation from the sun, this force field appears to be straight up as the heat is diffused by the atmosphere. This increases with the additional sun heat and can be recorded with thermometers, it varies from 2° to 6°F in direct relation to the number of times the ground or object has been burnt-over or Pentagons formed, with, in both cases, no noticeable increase in the temperature after five treatments.

If, however, tests are made inside a building with a mean average temperature, and a bunch of flowers, a plastic container of water, a ferreous metal object in which the dowsing effect has been induced, and a similar bunch of flowers, a plastic container of rainwater, or a ferreous metal object in which no dowsing effect is recorded with the rods, are set equidistant from a heat source such as an electric fire, when the heat source is turned on a force field is created between the heat source and the objects which give a dowsing effect, and this force field can be measured with the dowsing rods.

Along this energy field heat will be conducted to increase the temperature of the water in the container with the dowsing effect, when compared with the rain-water which has no dowsing effect. The flowers and any other object with the dowsing effect also become hotter; but this is not easy to measure. If the heat source is turned off, the force field fades away quickly and when turned on again returns as soon as heat is produced.

Electrical energy alone without heat does not produce the force field or transfer heat.

This force field can be stopped by placing a thin sheet of paper between the heat source and the object; but a sheet of glass or plastic does not stop the field forming, though it reduces its strength.

This effect is seen in the open ground in winter when there is little heat from the sun. Bulbs in areas of ground which have been burnt-over or pentagoned to give the maximum dowsing effect show increased growth even in very cold weather, whereas the bulbs in untreated ground stop growing completely.

This increase in ground temperature and growth which is recorded night and day is being conducted up the force field from the deeper layers of the earth, where the temperature is constant, to maintain the surface temperature up to 3°F warmer when compared with untreated ground. This effect is slow to become established; but the longer the ground shows a dowsing effect the more constant is this temperature rise in winter, and at night in the summer, when it is masked by the greater heat of the sun during the day.

A MAGNETRON GIVES A SIMILAR EFFECT

An exact replication of the burning-over and the Pentagon producing a dowsing effect which locks on to any heat source is found in the magnetron contained in a microwave cooker. Whether the cooker is or is not connected to the electricity supply, the magnetron produces a strong dowsing effect, and if any heat source such as a radiator, electric fire, cooker or kettle is switched on and heat is produced, a force field is immediately set up between the magnetron and the heat source, which can be measured with the dowsing rods, and the magnetron becomes warm enough for the heat to be felt with the hands.

This indicates a possible line of investigation which may explain why the dowsing effect produces a temperature rise, and link it with some form of short-wave radiation.

LIVING PLANT MATERIAL RETAINS THE DOWSING EFFECT

Bulbs moved from ground which has been burnt-over or treated with the pentagon contain a dowsing effect, and when replanted in fresh untreated ground, carry it with them and will continue to flower earlier in the first year, the effect being slowly lost in subsequent years.

If these bulbs are given burning-over or pentagon treatment in the year after planting, the additional treatment adds to the residual effect and they flower earlier than the additional treatment would lead one to expect. If bulbs which have been burnt-over or pentagoned to give a maximum dowsing effect and are left in the ground but not given additional treatment, the flowering time slowly moves back; it takes up to five years for them to flower at the time untreated bulbs do in late January/February. This is particularly true of bulbs in large fields as the southward drift of the dowsing effect takes a long time to move and finally to be leached out by the rain.

This was confirmed by the results of the farmers who stopped the straw burning in the early sixties; had the effect been immediate, the reason for the later flowering of the Soleil d'or would have been realized.

BENEFIT TO OTHER CROPS IS INDICATED

All other plants and crops generally give improved growth if subject to the increased temperatures of the dowsing effect. The plants most likely to give response are those which are being grown near the limit of their climatic temperature requirements. The Soleil d'or is a classic case, coming as it does from the Mediterranean region; freesias, bulbous iris, paper white and all the tazzetta-type narcissus come from the same region and all give a good response.

Very little has been done on vegetable crops. Winter broccoli, sweet corn, and early potatoes have given improved results in quality and crop, and it is expected that many others would benefit. The germination of seed is an area where the increased ground temperature has been shown to be beneficial. The time for normal germination of Freesia seed is approximately one month in the open; if after sowing the seed the ground is burnt-over or pentagoned three times, the seed is through in approximately two weeks.

Farmers in the eastern counties have observed that earlier and better germination of corn and sugar beet concides with the strip burning of stubble and trash of previous crops. There is also band ripening of corn which follows these lines, and is the result of the increase in ground and plant temperature.

The possibility that the pentagon method could be used to increase by several hundred square miles the area of the earth's surface in which corn can be grown successfully has yet to be tested; but all the indications are that it is possible.

TEMPERATURE RECORDS SHOW A LINK WITH THE SUNSHINE RECORDED

The temperature rises recorded, are definately linked to the hours of sunshine recorded in the day (see chart No. 5, pages 19/20), but rises are also recorded on days in which no direct sunshine is recorded, indicating that the radiation that produces these rises can penetrate cloud cover.

There are days, normally with dense fog, in which no rises are recorded, the only clue we have as to the wave length of the radiation is the fact that the magnetron, used in a microwave cooker, replicates exactly the effect that is produced by an object containing the dowsing effect and absorbs heat energy from any source and becomes warmer.

The magnetron when used as a cooker with a power input, produces high frequency radiation which rapidly heats up any object that contains water, and energizes any metal object. These are exactly the factors which are associated with the warming of the soil, bulbs, iron, etc. Soil and plants contain large quantities of water, iron collects the effect and stores it, so does water in the ground, and it flows through iron and water and moves south when the ground is full of water.

All the temperature records show the average over a period, and are taken from daily recordings in normal and treated ground by hand or with thermographs. These recordings have been taken in various areas of ground in which bulbs, Iris, Freesia, etc. were growing, with the object of relating the burning over, or pentagon treatment and normal ground, to show the temperature rises recorded produced advanced flowering, earlier germination of seeds, and in the case of potatoes, the increase weight of crop lifted. These temperature rises are the only tangible records we have of what we are doing to the ground and the plants in it. The results we obtain, with increased plant vigour, increase in weight, earlier flowering, improved health of the plants generally, suggests that we are doing far more than increasing the temperature of the soil, and the plants in it.

So far we have no instrument but the thermometer, other than the dowsing rods, which will record any change in the soil or plants when these treatments are given, and remember this is not new, this has been going on in the Isles of Scilly for sixty to seventy years, maybe longer.

We do not really understand gravity – we know what happens if we let go of something but we do not know why. We all use electricity, as long as we obey the rules we can use it to great advantage, but we do not know what it is. The Dowsing Effect, produced by some very strange means comes into this category, maybe we shall find out what it is, but we can make good use of it without knowing why.

SO WHY NOT GO OUT NOW AND USE IT, IT'S FREE. Form five pentagons round your house and garden, your house will be warmer in 7–14 days, and you will notice a saving on your fuel bills from then on. Your garden will benefit from the increased temperature, and the plants will show the effect. Provided you maintain these pentagons at all times, which means repeating the treatment once per year, this additional heat is yours for the taking.

CHART NO. 1

These charts show the average day temperature recorded three inches below the surface of the ground in burnt-over ground compared with normal ground (see page 5). Fahrenheit scale.

TEMPERATURES IN 1978

	Burnt-over three times in April. Day max.	Normal ground. Day max.	Day maximum increase
MAY	71.452	63.075	8.377
JUNE	78.338	75.642	2.596
JULY	81.404	76.952	4.452
AUG.	81.285	77.190	4.095
SEPT.	75.619	72.428	3.191
OCT.	64.205	61.617	2.588
NOV.	54.937	50.875	4.062
DEC.	49.635	47.000	2.635
Average 8 months	69.291	65.951	3.345

TEMPERATURES IN 1979

	Burnt-over three times.			Normal ground.			Day max. increase
	8.30 A.M.	Day max.	Diurnal	8.30 A.M.	Day max.	Diurnal	
JAN.	37.733	45.045	7.272	38.300	42.363	4.063	2.882
FEB.	42.875	48.875	6.000	41.325	46.175	4.850	2.700
MARCH	43.545	52.907	9.362	41.175	49.736	8.561	3.171
APRIL	47.470	62.333	14.863	45.794	57.194	11.400	5.138
MAY	54.475	67.833	13.358	55.050	62.904	7.854	4.929
JUNE	60.547	77.333	16.786	59.238	72.738	13.500	4.595
JULY	66.880	84.666	17.786	66.047	79.314	13.267	5.352
AUG.	64.761	77.875	13.096	61.136	74.190	13.054	3.667
SEPT.	56.357	70.857	14.500	55.476	66.857	13.381	2.000
OCT.	55.138	64.382	9.244	53.722	61.705	7.983	2.677
NOV.	45.785	52.928	7.143	44.142	50.571	6.429	2.357
DEC.	46.166	49.500	3.334	43.777	46.222	2.445	3.278
Average 12 months	52.083	62.876	11.060	50.431	59.330	8.899	3.562
Average 8 months	55.651	68.171	11.903	53.820	63.743	9.923	3.606

CHART NO. 2

This chart records the temperature in bulbs taken from ground which had been burnt over three times, compared with bulbs taken from normal untreated ground. First when lying on top of the ground three inches apart in the full sun, and later planted in burnt-over ground and untreated ground. The thermometers were pushed into the centre of the bulb and record the actual bulb temperature, not the ground temperature (see page 6). Fahrenheit scale.

	From burnt-over ground.			From untreated ground.			Max.
1978	8.30 A.M.	Maximum	Diurnal	8.30 A.M.	Maximum	Diurnal	increase
JULY	63.166	88.666	25.500	62.366	85.533	23.167	3.133
AUG.	62.391	82.913	20.522	62.043	80.739	18.696	2.177
SEPT.	59.400	84.550	25.150	59.500	81.300	21.800	3.250
			Bulbs planted in the ground.				
OCT.	53.555	71.333	17.778	53.444	67.777	14.333	3.556
NOV.	46.363	54.181	7.818	46.000	52.545	6.545	1.636
DEC.	43.923	49.083	5.160	43.538	47.333	3.795	1.750
1979							
JAN.	38.727	45.454	6.727	38.681	43.590	4.908	1.864
FEB.	42.125	49.850	7.725	41.975	48.050	6.075	1.800
MARCH	43.340	56.454	13.114	42.077	53.727	10.750	2.727
APRIL	47.764	66.705	18.941	47.000	63.941	16.941	2.764
MAY	52.952	73.523	20.571	52.761	70.761	18.000	2.762
JUNE	61.642	82.809	21.167	61.500	78.904	17.404	3.905
JULY	68.333	92.142	23.809	67.761	88.333	20.572	3.800
AUG.	62.656	61.952	19.316	62.227	78.761	16.534	3.191
SEPT.	58.400	75.950	17.550	58.500	73.300	14.800	2.650
OCT.	54.722	64.500	9.778	54.555	62.500	7.954	2.000
NOV.	45.571	51.285	5.714	45.285	50.857	5.572	0.428
DEC.	43.928	49.083	5.155	43.536	47.333	3.797	1.750
Average Temp. 1979	51.678	65.808	14.130	51.396	63.338	11.941	2.470

CHART NO. 3

This chart shows the temperatures recorded in two ferreous metal pipes three feet long, set side by side in full sun on a wooden structure one of which was joined with ferreous metal wire to a tubular structure, which had removed the dowsing effect from burnt-over ground in which Freesias were growing, and the structure itself gave a strong dowsing effect. This flowed through the wire to give this pipe a strong dowsing effect. The other pipe not so joined gave no dowsing effect (see page 7). Fahrenheit scale.

1979 MARCH	*In the pipe with a dowsing effect.*			*No dowsing effect.*				
Day temperature	8.30 am.	Day max.	Diurnal	8.30 am.	Day max.	Diurnal	Max. increase	Sun hours
Day 1	45.0	68.5	23.5	46.0	64.0	18.0	4.5	5.0
2–4	45.5	73.0	27.5	45.5	68.0	22.5	5.0	8.8
5	37.5	62.5	25.0	37.5	59.5	22.0	3.0	7.7
6	45.5	56.5	11.0	44.5	54.5	10.0	2.0	1.2
7	48.0	60.0	12.0	48.0	56.5	8.5	4.0	8.7
8	40.5	62.0	22.0	41.0	59.0	18.0	3.0	4.9
9–11	49.5	59.5	10.0	48.5	54.5	6.0	5.0	4.0
12	41.5	63.5	22.0	41.5	51.5	18.0	4.0	0.2
13	43.5	51.5	8.0	43.5	50.5	7.0	1.0	0.7
14	41.5	54.0	12.5	31.0	50.0	9.0	4.0	4.1
15	37.5	55.5	18.0	37.0	51.5	14.5	4.0	5.6
16–18	31.5	64.5	33.0	32.0	61.0	29.0	3.0	6.1
19	28.0	59.0	31.0	28.0	57.0	29.0	2.0	1.7
20	35.0	62.0	27.0	35.0	59.0	24.0	3.0	4.6
21	34.0	60.5	26.5	35.0	57.5	22.5	3.0	8.0
22	35.0	64.5	29.5	35.0	62.0	27.0	2.5	9.7
23–25	30.0	63.0	33.0	30.0	59.0	29.0	4.0	7.5
26	39.0	66.0	27.0	38.0	62.0	24.0	4.0	3.1
27	42.0	55.0	13.0	42.0	52.0	10.0	3.0	2.4
28	36.5	56.0	19.5	36.0	53.0	17.0	3.0	8.0
29	38.0	45.5	7.5	38.0	45.0	7.0	0.5	0.7
30	40.0	53.5	13.5	40.0	51.0	11.0	2.5	1.7
31	39.0	56.0	17.0	39.0	53.0	14.0	3.0	2.5
Month average	39.282	59.630	20.391	39.217	56.456	17.260	3.173	4.647

A number of dwelling houses have had pentagons put round them and become warmer by all acceptable standards, such as reduced fuel cost to maintain adequate temperatures. It is difficult to produce two identical houses, with everything equal, to check the accuracy of a temperature rise produced by the dowsing effect.

The above two pipes are as near to separate isolated entireties, and while they are very much smaller, are similar in all other ways to a house, or man-made structure, as it was possible to produce with the resources available. A house would behave more like the ground, and show less rapid variations in temperature, due to its greater insulation, so would retain heat built up during the day to maintain night temperature.

CHART NO. 4

TEMPERATURE IN BURNT-OVER AND NORMAL GROUND IN 1980

	Burnt-over three times.			Normal ground.			Day max.
	8.30 A.M.	Day max.	Diurnal	8.30 A.M.	Day max.	Diurnal	increase
JAN.	41.630	46.043	4.413	39.630	43.260	3.630	2.783
FEB.	45.595	52.150	6.555	44.380	49.925	5.543	2.225
MARCH	44.452	54.045	9.593	42.976	52.409	9.433	1.636
APRIL	50.558	66.828	16.270	49.323	64.246	14.941	2.546
MAY	55.375	71.725	16.350	53.150	68.725	15.575	3.000
JUNE	59.380	74.833	15.453	57.642	71.476	13.834	3.375
JULY	61.630	78.956	17.326	59.782	75.913	16.131	3.043
AUG.	62.450	75.800	13.350	62.625	73.425	10.800	2.375
SEPT.	59.022	72.750	13.728	57.204	69.977	12.783	2.773
OCT.	52.261	59,880	7.619	50.047	57.119	7.072	2.761
NOV.	48.437	52.375	3.938	46.000	50.000	4.000	2.375
DEC.	44.033	48.500	4.467	41.733	46.133	4.400	2.367
Average 12 months	52.071	62.823	10.429	50.374	60.218	9.844	2.762

The low average temperature increases during 1980 reflect the very bad summer particularly the lack of bright sunlight which produces the temperature increase.

TEMPERATURE IN PENTAGON-TREATED GROUND IN 1980

Pentagoned three times.

	8.30 A.M.	Day max.	Diurnal	Day max. increase	
JAN.	40.173	45.434	5.261	2.174	
FEB.	44.000	52.404	8.404	2.479	
MARCH	42.880	54.333	11.453	1.924	
APRIL	49.176	68.294	19.118	4.030	
MAY	53.210	72.973	19.763	4.248	
JUNE	59.400	75.560	16.160	4.087	
JULY	59.897	79.026	19.129	3.113	NORMAL GROUND AS
AUG.	60.450	76.425	15.975	3.000	ABOVE
SEPT.	56.954	73.840	16.886	3.663	
OCT.	49.761	60.357	10.596	3.238	
NOV.	46.000	52.312	6.312	2.312	
DEC.	41.833	48.200	6.367	2.067	
Average 12 months	50.311	63.262	12.951	3.044	

The increased temperature rise produced by the pentagon method is shown quite clearly when compared with the burnt-over ground in the same year (see page 9).

CHART NO. 5

This chart shows the daily maximum temperature in normal ground and burnt-over or pentagon-treated ground, the temperature rise produced, compared with the hours of sunshine recorded (see page 15).

1978 JUNE Day	Normal ground	Burnt-over ground	Tem. rise	Sun hours
1	69.0	72.5	3.5	1.9
2–4	78.0	85.0	7.0	11.3
5	72.5	76.0	4.0	9.4
6	77.0	81.0	4.0	9.2
7	68.0	69.5	1.5	0.0
8	66.5	67.5	1.0	0.0
9–11	79.0	86.5	7.5	14.9
12	70.0	74.0	4.0	2.9
13	68.0	73.5	5.5	6.5
14	70.0	75.5	5.5	3.5
15	73.0	77.5	4.5	9.4
16–18	82.0	87.0	5.0	14.8
19	78.0	84.5	6.5	11.0
20	77.0	83.0	6.0	7.0
21	71.0	74.5	3.5	2.0
22	69.0	73.5	4.5	8.3
23–25	73.0	80.0	7.0	13.5
26	64.0	70.5	6.5	1.3
27	72.0	75.5	3.5	1.4
28	68.0	72.0	4.0	0.0
29	68.0	72.0	4.0	3.6
30	75.0	81.0	6.0	12.8
Average			4.75	6.577

OCT. Day	Normal ground	Burnt-over ground	Tem. rise	Sun hours
1–2	60.0	62.0	2.0	7.3
3	63.5	67.5	4.9	6.0
4	63.0	67.0	4.0	3.2
5	65.0	67.0	2.0	0.0
6–8	64.5	67.5	3.0	6.4
9	64.0	67.0	3.0	3.2
10	62.0	66.5	4.5	3.0
11	63.0	65.0	2.0	6.0
12	65.0	67.0	2.0	6.7
13–15	63.0	66.0	3.0	2.0
16	59.0	60.5	1.5	1.8
17	56.5	58.0	1.5	1.9
18	56.0	58.0	2.0	0.2
19	55.5	57.0	1.5	0.0
20–22	62.5	64.0	1.5	4.8
23	62.0	63.5	1.5	5.5
24	63.0	66.0	3.0	3.3
Average			2.470	3.605
25–30	No records available			

CHART NO. 5 continued

1979 JUNE Day	Normal ground	Burnt-over ground	Tem. rise	Sun hours
1–2	72.0	78.0	6.0	13.2
4	72.0	77.0	5.0	5.6
5	72.5	78.5	6.0	8.2
6	71.0	76.5	5.5	9.1
7	75.0	80.5	5.5	5.3
8–10	73.0	78.5	5.5	9.6
11	73.0	78.0	5.0	2.6
12	62.0	64.5	2.5	0.0
13	59.0	61.0	2.0	0.0
14	65.0	69.5	4.5	2.3
15–17	82.5	82.0	7.0	15.2
18	80.5	88.0	7.5	14.3
19	78.0	85.5	7.5	14.3
20	78.0	81.5	3.5	5.6
21	73.0	74.5	1.5	4.4
22–24	75.5	77.0	2.0	2.9
25	64.0	65.5	1.5	0.6
26	78.0	83.5	5.5	6.7
27	72.0	75.5	3.5	0.5
28	71.5	75.0	3.5	0.0
29–30	80.5	87.0	6.5	5.2
Average			4.619	5.933

OCT. Day	Normal ground	Burnt-over ground	Tem. rise	Sun hours
1	67.0	69.5	2.5	7.6
2	59.5	61.5	2.0	0.1
3	59.0	61.0	2.0	0.0
4	67.0	70.0	3.0	9.7
5–7	63.0	65.5	2.5	7.8
8	60.0	62.0	2.0	0.0
9	63.5	66.5	3.0	5.3
10	64.0	67.0	3.0	3.9
11	64.5	66.5	2.0	0.0
12–14	61.0	64.0	3.0	6.5
15	63.0	66.5	3.5	3.8
16	64.5	67.5	3.0	7.8
17	59.0	61.0	2.0	3.2
18	58.0	61.0	3.0	2.6
19	60.0	65.0	5.0	6.6
20–22	55.0	55.5	0.5	0.0
23	61.0	64.5	3.5	8.5
24	59.5	61.5	2.0	0.0
Average			2.638	4.061
25–30	No records available			

On examining these records it will be noted that increased sunshine does produce an increased temperature rise, but the energy which comes with the sun, can also penetrate light cloud cover to give a temperature rise. Only on a few days is this source of radiation not able to get through, as we know that the magnetron in a Microwave cooker behaves in a similar way it suggests that this heat source is in the ultra short wave range.

DOWSING RODS

The modern dowsing rods are basically two pieces of ferreous metal wire approximately 18 inches long, bent at right angles one-third along their length; they can be used simply by holding the one-third bent-down end loosely in the hands. If more refinement is required, the one-third bent end can be slid into old plastic pens or short lengths of bamboo cane so that the wire rotates freely to form handles. These are easier to use and more accurate; further refinements can be made but do not increase their efficiency.

Dowsing rods should be held in the hands so that they fall naturally slightly forward in parallel lines approximately six inches apart. With the rods in this position walk into an area in which the dowsing effect has been induced, or over a water pipe or similar object on or under the ground, and the rods will cross by swinging one over the other as the hands pass over the area or object and will return to the original parallel position when moved clear.

The rods do not work unless held by a person: the human body is the collector of the force; the rods indicate only the strength of the dowsing effect. Care must be taken not to face due east or west in areas which show a dowsing effect, as no response can be obtained with the hands in a north–south line.

Some people do not get any response from the rods; approximately 10% fail completely. 10–15% can get a response if they remove everything made of metal such as keys, coins, watches, etc.; if their clothes have large metal zip fasteners they must also be removed. The remaining 75% seem to have no problem; 5% of these get a very strong response and would have been the traditional dowsers of the past, who worked with forked twigs to search for water.

HOW TO USE THE DOWSING EFFECT TO YOUR ADVANTAGE

As the previous chapters have shown, this force can be used successfully by everybody provided the rules are obeyed; and these are easy but exact. The first rule is to trust the dowsing rods; if they do not cross there is no temperature rise and the rules have not been followed.

The burning-over must be with a flame of sufficient heat to burn off trash, weeds, etc., and slow moving enough for one burning-over to cause the dowsing rods to cross thus X.

Each additional burn can move over the ground twice as fast as the first burn, provided all the trash has been burnt off, as the flame is now direct on to the ground; the dowsing effect may be increased by this means until the dowsing rods cross thus ⤫, indicating a maximum dowsing effect. This is normally achieved by one slow burn (1/3 m.p.h.) and four faster burns (2/3 m.p.h.). The dowsing rods are the final test. The burning-over must be at a minimum of 7 days interval to produce additional effect and temperature rise.

The Pentagon method has the advantage of simplicity and can be carried out at any time, over growing crops or bare ground and produce the maximum temperature rise at no cost. Forming one pentagon causes the dowsing rods to cross thus: **X** and it requires up to four more pentagons to be formed round the area to produce the maximum dowsing effect with the rods crossed thus ⤫. The pentagons can be formed one after the other, but experience has shown that forming them at weekly intervals, as in burning-over. does produce a greater effect.

The disadvantage of the pentagon method is that it does not clean the ground, and when using it over permanent crops, such as bulbs, this is essential to obtain maximum effect. As shown in chapter (force field) any material between the object containing the dowsing effect and the heat source, even a piece of paper, will prevent the force field forming, and as the bulbs are under the ground weeds or trash of any kind on top of the ground, however little, reduces the heat input. Once the bulbs' growth is through the ground, the bulbs themselves absorb the heat and this is clearly indicated in the bulb fields.

If, however, the pentagon method is used over freshly cultivated ground, such as a seed bed, or when planting broccoli or potatoes, then no problem arises. A combination of burning-over and the pentagon method can overcome this problem. One slow burn to remove weeds and trash etc., followed by four pentagons are equal to five burnings-over and save money in tractor time and propane gas.

To use the pentagon method in a private house and garden it is simpler to go completely round the outside; most houses and gardens are approximately rectangular and all that is required is to mark an exact spot in one corner of the back garden, then move across and mark the other corner; if the house fills the full width of the plot, pass through the house and mark the next corner of the front garden by continuing round the plot, move out into the road, mark a spot 6 feet from the middle of the plot, continuing round mark the other corner of the front garden, return through the house to touch the original starting spot; this must be the exact spot, 1 inch out will not do. One pentagon has now been marked out and the dowsing rods will indicate **X** if the pentagon has been correctly formed. Mark out four more in exactly the same way and the dowsing rods will indicate ⤫; the maximum ground temperature rise will be obtained in approximately 14 days time, and this will include the house temperature. There are many variations on this and provided the five-sided figure is marked out in a 1–6 sequence the line taken between the points does not have to be the most direct.

At all times trust the dowsing rods and if the effect fades or moves, as it will, it can easily be replaced. If preferred small areas can just as easily be marked out by the same method, and comparisons of ground temperatures can be made.

A warning must be given to any person taking temperature readings in ground containing the dowsing effect. The mercury in the thermometer takes up the dowsing effect and will record a temperature rise even if removed from the ground, or moved to another site, so extreme care must be exercised. All thermometers must be cleared of the effect by placing them on the north side of a ferreous metal object, such as an iron pipe or rod, and leaving them for at least 24 hours, by which time the dowsing effect will have moved into the iron pipe; but the thermometer must be checked with the dowsing rods before being used again. If this is not done some very unexpected temperatures will result.

The private gardener will find, as the farmers have, that any iron tool used in cultivation will remove the dowsing effect, though to a limited extent. Hoes, rakes etc. will pick it up as they are being used; a spade left dug in the ground for a period of a few hours will remove a 12-foot diameter circle and, should this happen, the pentagon must be used to replace it. Water in the ground removes the effect continuously, and it drifts south particularly in winter. Therefore the pentagon must be used to replace it, and a check with the dowsing rods will indicate when this is necessary.

ECHOES FROM THE PAST

The claim that many metals under ground can be located with dowsing rods can easily be explained by the fact that metals generally attract the dowsing effect. All ground contains the dowsing effect to a greater or lesser degree at one time or another, and all metals collect what little of the dowsing effect there is and concentrate it in the same way as water does, until the effect is strong enough to be recorded with the dowsing rods. Metals do not move in the ground as water does, and it is known that metals can attract the effect over a 6-foot radius circle, so they may take years to collect a measurable effect.

The old stories of beating the bounds, in which all the parishoners made a circle of the village once a year and beat selected points on the way round to increase the crops and ensure a good harvest, were probably connected to the forming of a pentagon in the past and, quite unknown to the participants, produced the dowsing effect over the whole parish; this would have produced a temperature rise, and so have increased the crops and ensured a good harvest.

The fell and burn method of cultivation used by primitive tribes all over the world probably owes a lot of its success to the temperature rise of the soil produced by the burning.