

Studies in Philosophical Psychology

DREAMING



NORMAN MALCOLM

Edited by R. F. Holland

DREAMING

**STUDIES IN
PHILOSOPHICAL PSYCHOLOGY**

Edited by
R. F. HOLLAND

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DREAMING

by

NORMAN MALCOLM

Saepe litterati tam ingeniosi esse solent, ut invenerint modum
caecutiendi etiam in illis quae per se evidentia sunt atque a
rusticis nunquam ignorantur. DESCARTES, *Regula XII.*



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NORMAN MALCOLM

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Cornell University

Introduction

MANY philosophers and psychologists who have thought about the nature of dreams, have believed that a dream is both a form of mental activity and a conscious experience. Descartes held that a human mind must be conscious at all times, this notion resulting from his supposed demonstration that the 'essence' or 'principal attribute' of mental substance is consciousness, and that so long as a mind exists there must exist 'modes' of that essence, i.e. states of consciousness, mental occurrences and mental acts. He says in a letter:

I had good reason to assert that the human soul is always conscious in any circumstances—even in a mother's womb. For what more certain or more evident reason could be required than my proof that the soul's nature or essence consists in its being conscious, just as the essence of a body consists in its being extended? A thing can never be deprived of its own essence (Descartes (1), p. 266).

According to Descartes, a dream is a part of this continuous mental life. It consists of thoughts, feelings and impressions that one has when asleep. In *Part IV* of the *Discourse on the Method*, speaking of the 'illusions' of dreams, he says that 'all the same thoughts and conceptions which we have while awake may also come to us in sleep' (Descartes (2), I, p. 101). In the *First Meditation* he represents himself as at

first thinking that surely it is *certain* that he is seated by a fire, but then as rejecting this in the following remark: 'But in thinking over this I remind myself that on many occasions I have in sleep been deceived by similar illusions, and in dwelling carefully on this reflection I see so manifestly that there are no certain indications by which we may clearly distinguish wakefulness from sleep that I am lost in astonishment' (*Ibid.*, p. 146). In his reply to Hobbes' criticisms of the *Meditations*, the assertion that he has often been deceived while asleep is repeated in the rhetorical question: 'For who denies that in his sleep a man may be deceived?' (*Ibid.*, II, p. 78). Descartes thinks not only that a man might have thoughts and make judgments while sleeping, but also that if those thoughts are 'clear and distinct' they are true, regardless of the fact that he is sleeping. In his reply to the Jesuit, Bourdin, he says: '... everything which anyone clearly and distinctly perceives is true, although that person in the meantime may doubt whether he is dreaming or awake, nay if you want it so, even though he is really dreaming or is delirious' (*Ibid.*, II, p. 267). In the *Discourse* he makes a similar comment: 'For even if in sleep we had some very distinct idea such as a geometrician might have who discovered some new demonstration, the fact of being asleep would not militate against its truth' (*Ibid.*, I, p. 105). He further remarks that 'whether we are awake or asleep, we should never allow ourselves to be persuaded excepting by the evidence of our Reason' (*Ibid.*, pp. 195-106), implying that a person can reason, can be persuaded, and can resist persuasion though all the while he is asleep.

The idea that to dream is to be mentally active while asleep and that a dream is a conscious experience is not peculiar to Descartes. Aristotle says that 'the soul' makes 'assertions' in sleep, giving in the way of example a dream that 'some object approaching is a man or a horse' or that 'the object is white or beautiful' (Aristotle, 458b). Kant makes the following remark: 'In deepest sleep perhaps the greatest perfection of the mind might be exercised in rational thought. For we have no reason for asserting the opposite except that we do not remember the idea when awake. This reason, however, proves nothing' (Kant (1), p. 275). Moore, speaking of 'mental acts or acts of consciousness', says: 'We cease to perform them only while we are asleep, without dreaming; and even in sleep, so long as we dream, we are performing acts of consciousness' (Moore (1), p. 4). Russell makes the following assertion: 'What, in dreams, we see and hear, we do in fact see and hear, though, owing to the unusual context, what we see and hear gives rise to false beliefs. Similarly, what we remember in dreams we do really remember; that is to say, the experience called "remembering" does occur' (Russell (1), pp. 214-215).

Freud remarks that 'Obviously, the dream is the life of the mind during sleep . . .' (Freud (1), p. 79) and that 'Dreams . . . are the mode of reaction of the mind to stimuli acting upon it during sleep' (*Ibid.*, p. 80). He thinks of dreams as 'mental processes during sleep' and undertakes to compare them with the mental processes of persons who are awake (e.g., *Ibid.*, pp. 80-81). A contemporary psychologist declares that 'Dreams are a form, probably the most

primitive form, of ideation in which experiences and situations of the day and of life are reproduced on the screen of the mind during sleep as images, usually in visual form' (Hadfield, p. 70).

Quite recently two philosophers have explicitly endorsed the Cartesian view of dreams. 'To say that one dreams is to say that one sees, hears, touches, etc., while asleep'. '... we should maintain, with Descartes, that if anyone dreams that he believes, doubts, expects, desires, etc., then he really does' (Yost & Kalish, pp. 120-121). 'People can really believe sentences to be true while they are dreaming' (*Ibid.*, p. 121). 'Dreaming is a real experience. And since dreams can be remembered, they must be conscious experiences. Just as it is correct to say that a dreamer really dreams and does not merely dream that he dreams, so it is correct to say that a dreamer is really aware of the contents of his dream and does not merely dream that he is aware of them' (*Ibid.*, p. 118).

It is no exaggeration to say that it is the received opinion, among philosophers and psychologists, that dreams are 'the activity of the mind during sleep' (Hadfield, p. 17). I wish to examine this opinion.

ASSERTING THAT ONE IS ASLEEP

IF Aristotle were right in saying that when a man is asleep he can assert that 'an approaching object' is a man or a horse, one would think that another thing he could do would be to assert that he himself is asleep. It will be useful to reflect on the sentence 'I am asleep' and the supposed possibility that, by uttering it, a person could claim that he is asleep. It is possible that the sentence 'I am asleep' should come from the lips of a sleeping person. In this sense he could 'say' that he is asleep: but could he *assert* (claim, maintain) that he is asleep? If so it would appear that you might find out that he is asleep from his own testimony. This will strike everyone as absurd. If it was a question in a court of law whether a certain man had been asleep at such and such a time, the fact that he had said the sentence 'I am asleep' at that time would not be admitted as affirmative evidence.

In general we rely heavily on a man's own testimony when it is a question whether he is hungry, depressed, or in love. Should we do the same when we want to know whether he is asleep? We may discount a young man's claim to be in love on the ground that he is exaggerating or is not entirely sincere. Would similar considerations make us discount someone's claim that he is asleep? Should we wonder if he is perhaps

overstating the case or even lying? Of course not. 'He claims that he is asleep but I suspect he is not telling the truth', 'He says that he is asleep and I believe him', are both ridiculous sentences. Their absurdity brings out the point that we should not consider an utterance of the words 'I am asleep' as the making of a claim, and therefore not as either a trustworthy or untrustworthy claim. In saying them to us a man can neither lie nor tell the truth. If you say to someone, who looks as if he might be asleep, 'Are you asleep?', his reply 'Yes I am' is playful nonsense.

Hypnotists often say to their subjects, 'You are asleep now, aren't you?', and it is hoped that the subject will say 'Yes I am'. This does not mean that his words are taken as testimony but rather as showing that he is responsive to the suggestions of the hypnotist. The same purpose would be served by the question 'You are sitting down now, aren't you?' (when the subject is standing). In both cases the affirmative reply is useful not as testimony but as showing that the hypnotist has succeeded in bringing the subject under his influence.

If I say 'He is sleepy' of someone, I make an assertion that entails the assertion he would make if he said 'I am sleepy'. There is not this relationship between 'He is asleep' and 'I am asleep'. If someone said the latter either he would be making no assertion at all or else he would be using his words in a different sense, e.g. to mean that he does not wish to be disturbed. 'I am asleep' does not have a use that is homogeneous with the normal use of 'He is asleep'. Here there is a similarity between 'I am asleep' and 'I am unconscious': neither sentence has a use that is

homogeneous with the normal use of the corresponding third person sentence. It would not occur to anyone to conclude that a man is asleep from his saying 'I am asleep' any more than to conclude that he is unconscious from his saying 'I am unconscious', or to conclude that he is dead from his saying 'I am dead'. He can say the words but he cannot *assert* that he is asleep, unconscious, or dead. If a man could assert that he is asleep, his assertion would involve a kind of self-contradiction, since from the fact that he made the assertion it would follow that it was false. If such an assertion were possible then it could sometimes be *true*. While actually asleep a man could assert that he was asleep. There is where the absurdity is located. 'While asleep, he asserted that he was asleep' is as senseless as 'While unconscious, he asserted that he was unconscious', or 'While dead, he asserted that he was dead'.

JUDGING THAT ONE IS ASLEEP

IT may be thought that my argument obtains a specious plausibility from a feature of the connotation of 'assert', namely, that to say that someone asserted so and so is to say that he declared it to another person. Admittedly a man who is asleep cannot address another person, it may be said, because this would imply a perception of the presence of the other person, which would falsify the hypothesis that he is asleep.¹ 'Claim' and 'maintain' have the same connotation, and so it is true that a sleeping man cannot assert or claim or maintain that he is asleep. But 'judge' does *not* have this connotation. People make many judgments that they do not express to anyone. From the fact, therefore, that one cannot make assertions while asleep, it does not follow that one cannot make judgments. And indeed they are made during sleep. For example, St. Thomas says that 'sometimes while asleep a man may judge that what

¹ Yost and Kalish explicitly maintain the interesting paradoxical view that it is merely a *contingent* truth that one does not have 'veridical' visual and auditory perceptions while asleep. After declaring that to dream is to see, hear, touch and so on, while asleep, they go on to remark as follows: 'We should then say that *in fact* all visual contents of dreams are non-veridical. Perhaps all auditory and most tactual contents of dreams are non-veridical. But they all *could be* veridical' (Yost & Kalish, pp. 120-21).

he sees is a dream . . . ' (Aquinas, I, Q. 84, Art. 8).¹

If a man can make judgments during sleep then it ought to be possible for him to judge, among other things, that he is asleep. The view being considered is that this is a possible judgment but not a possible assertion. Is it possible that I should be able to say to myself something that is significant and perhaps even true but that if I were to try to say this very same thing to others my statement would be logically absurd? Surely there is something dubious in the assumption that there can be a true judgment that cannot be communicated to others.

I will not pursue this problem. Instead I will raise the question of whether it can be verified that someone *understands* how to use the sentence 'I am asleep' to describe his own state. If there is that use of the sentence it ought to make sense to verify that someone has or has not mastered it. An indication that someone understands the use of a sentence to describe some state of affairs might be the fact that he utters the sentence sometimes when, and only when, that state of affairs does exist and utters the negation of the sentence sometimes when, and only when, that state of affairs does not exist: for example, he says 'The wind is blowing hard' sometimes when and only when the wind is blowing hard; and he says 'the wind is not blowing hard' sometimes when and only when the wind is not blowing hard. In general such a correlation is neither a necessary nor a sufficient condition for

¹ St. Thomas makes the curious addition that 'if a man syllogizes while asleep, when he wakes up he invariably recognizes a flaw in some respect' (*Ibid.*).

understanding the use of a sentence: it is possible that a particular sentence should be understood and yet each time it is uttered the description it expresses should be false, just as it is possible that a particular order ('Put your hand in this fire!') should always be disobeyed, even though it is impossible that *all* orders should always be disobeyed Wittgenstein § 345). Still the correlation would, in some circumstances, provide evidence of understanding. Could we obtain evidence of this sort in the case of the sentence 'I am asleep'? Could we observe that someone utters it sometimes when (and only when) the 'right' state of affairs exists, namely, when he is indeed asleep? And could we infer from this, with some probability, that he understands the supposed use of that sentence to describe his own state?

Now how could one verify that a man says 'I am asleep' to himself when he is asleep? How could one find out that he did this even once? If he talked in his sleep, saying aloud 'I am asleep', this would not count either for or against his understanding of that sentence, since a man who is talking in his sleep is not aware of what he is saying. Here I am merely commenting on the idiomatic use of the expression 'talking in his sleep'. We do not affirm it of someone who is aware that he is talking.

In order to know that when a man said 'I am asleep' he gave a true description of his own state, one would have to know that he said it while asleep *and* that he was *aware* of saying it. This is an impossible thing to know, because whatever showed that he was aware of saying that sentence would also show that he was not asleep. The knowledge required is impossible because

it is self-contradictory. Can there, therefore, be such a thing as knowing that another person understands the supposed use of the sentence 'I am asleep' to make a judgment about his own state?

It may be thought that we could appeal to the sleeper's testimony after he awakened. Suppose he told us that he had said 'I am asleep' while he was asleep. But this report would presuppose that he already knew when to say 'I am asleep', and so it could not be used to establish the point at issue without begging the question. That is to say, his claim that he said certain words *while asleep*, implies that he was *aware* of being asleep and so implies that he knows how to apply the sentence 'I am asleep'. If he does not, his report is worthless. If we have no way of establishing that he knows how to use the sentence *other* than by appeal to his testimony, then we cannot appeal to his testimony.

It may be thought that from the fact that a person could be taught and learn how to use the third person sentence 'He is asleep' we could safely conclude that he would know how to use the first person sentence. This conclusion would have no justification at all. The use of the sentence 'He is asleep' is governed by criteria of the following sort: that the body of the person in question is relaxed, his eyes closed, his breathing steady; and that he is unresponsive to moderate sounds and happenings in his vicinity. It cannot be supposed that these criteria are to govern the use of the first person sentence. How absurd it would be for someone to judge that he himself is asleep from the fact that his eyes are closed and that he does not react to various sounds! If 'I am asleep' were used to make a

judgment, this use would differ so greatly from that of 'He is asleep' that an understanding of the latter would not argue an understanding of the former.

We are now in a position to see that the sentence 'I am asleep' cannot be used to make a judgment. Let us remember that no one can know whether another person makes a correct use of the sentence 'I am asleep' to describe his condition, since such knowledge would be self-contradictory. Is it nonetheless *possible* that he does make a correct use of it? Could not he himself know or at least believe that he uses it correctly? Suppose that I say to myself 'I am asleep' and believe that this sentence accurately describes my condition. I *believe* that it does—but does it? What could this distinction mean here? How should I find out whether my condition is really that of being asleep? Obviously I cannot ask someone, for this act would itself prove that I am not asleep.

Could I upon awaking describe my previous condition and inquire whether that condition is called 'being asleep?' This suggestion loses all plausibility if we ask what the nature of this description would be. For it could not mention facts about my bodily condition at the time (e.g. that my eyes were closed) since my having been aware of those things would entail that I was not then asleep. The description would have to be of some conscious *experience*. But having some conscious experience or other, no matter what, is not what is meant by being asleep, i.e. the statement 'Jones is asleep' is not false because there is some experience or other that Jones does *not* have. Nor could I reason as follows: 'They tell me that I was asleep just now; so by remembering what my state

was, I shall be able to identify future states of myself as states of sleep'. For what is it exactly that I am supposed to remember? Not some condition of my body: I cannot be supposed to identify in that way a present state of mine as sleep. Not some conscious experience, for the reason already given. The memory of my state of sleep turns out to be an unintelligible notion, since nothing can be plausibly suggested as the *content* of the memory.

Neither when awake nor when asleep, can I discover what the correct use is of the sentence 'I am asleep'. I am left with my *belief* that I use it rightly. But this is not a 'belief' in the sense in which a belief can be replaced by knowledge. Neither I nor anyone else can find out whether the state of myself that I claim to describe by the sentence 'I am asleep' really is the state of being asleep. The possibility of finding this out must be rejected as a conceptual absurdity. There could be nothing whatever that would tend to show that I employ that sentence correctly. I have no conception of what it would mean to say that not only have I identified my state as that of sleep but that my identification is furthermore *right*. As Wittgenstein remarks about a similar problem: 'In the present case I have no criterion of correctness. One would like to say: whatever is going to seem right to me is right. And that only means that here we can't talk about "right" ' (*Ibid.*, § 258).

Anyone who thinks that a sleeping man can judge that he is asleep will naturally mean that this judgment is true. The above argument is intended to prove that the notions of truth and falsity can have no meaningful application to one's judgment that one is

asleep, and that therefore the sentence 'I am asleep' cannot have a correct use (nor an incorrect one) to express a judgment of one's state. In the nature of the case nothing could even *tend* to prove that this judgment was *true* (or false). We do not have and cannot have any idea of what the difference between truth and falsity would come to here. Which is to say that a judgment that one is asleep is not an intelligible notion. Thus the view is untenable that although one cannot *assert* that one is asleep one can *judge* that this is so. The sentence 'I am asleep' cannot have a correct use to describe one's state and therefore it is not a vehicle for a possible judgment.

A COMPARISON OF 'I AM ASLEEP'
AND 'I AM IN PAIN'

THE point just established being important, I want to reinforce the argument by comparing the sentences 'I am asleep' and 'I am in pain'. The reason for this particular comparison is that there is an inclination to think that these two sentences must have the same sort of use, namely, to describe states of oneself. One does not find out that one is in pain by employing a criterion. Indeed it makes no sense to speak of *finding out* that one is in pain, when this would imply that one was previously in pain but not aware of it. There is, however, a criterion for determining whether someone uses the sentence 'I am in pain' *correctly*—and this makes it an intelligible sentence. The behaviour and circumstances of an infant are the original criterion of his being in pain. As he grows and begins to talk it will normally come about that often when his behaviour and circumstances are those of a person in pain he will say the words 'It hurts', or some synonymous ones; and hardly ever will he say them when either his behaviour or circumstances do not satisfy the original criterion of pain. This development fulfills our criterion of his *understanding* those words. *Now* his saying them serves as a *new* criterion of his being in pain. We shall

conclude sometimes that he is in pain from his mere say-so, even though his behaviour and circumstances are not a paradigm of pain. He can *tell* us that he is in pain, and we can *know* that he is because he has told us. This is possible because his verbal expression has been conjoined with certain behaviour (the natural, primitive, behaviour of a person in pain) occurring in certain circumstances (e.g. he has been hit or cut or burned). (Wittgenstein, § 244). His saying 'I am in pain', either to others or to himself, can be a use of language only because a connection has already been established between those words and the outward phenomena that are the original criterion of pain.

Consider now the sentence 'I am asleep'. With sleep, as with pain, there is an outward criterion—that is, something that determines whether another person (not oneself) is asleep. The original criterion of pain, we said, necessarily plays a part in establishing whether someone understands the sentence 'I am in pain'. Is the same thing possible with the sentence 'I am asleep?' No. For try to suppose that the saying of those words by someone was conjoined with the bodily state and the unresponsiveness that are a criterion of sleep. The question would be relevant: Was he *aware* of saying 'I am asleep?' We need an outward criterion for determining this. Does he show a degree of alertness and knowledge of what he is doing that is normal in one who is awake? If the answer is affirmative, then he is not asleep. If negative, then he was not aware of saying anything. In neither case has the *right* kind of connection been made between those words and the fact they are supposed to describe. It is a logical impossibility that there should be a

criterion for saying that someone understands how to use the sentence 'I am asleep' to describe his present state. This is equivalent to saying that the idea of such a use is not intelligible.

Occasionally someone uses the words 'I am asleep' to mean something like 'Go away! I am trying to sleep'. But the sentence 'I am asleep' cannot have a use that is homogeneous with the normal use of the declarative sentence 'He is asleep'. If someone thinks that he does use the words in such a sense, then we see that it would be impossible for him to illustrate his use of the words or to teach it to others. If he says that he uses the sentence to describe a certain condition of himself, he cannot say *what* condition it is. He cannot get around this difficulty by saying 'Well you understand the meaning of "*He is asleep*". When I use "I am asleep" to describe my own condition, I use it in that *same* sense'. A connection in sense between 'I am asleep' and 'He is asleep' is exactly what cannot be established, since the fulfilment of the criterion of *truth*, relative to the third person sentence, can play no part in the fulfilment of the criterion of *understanding*, relative to the first person sentence. That this can play a part in the case of the corresponding 'pain' sentences is what permits a connection of sense to be established there.

Thus if anyone claims that he sometimes observes himself to be asleep his claim is necessarily unintelligible. He implies that what he observes could be described by the sentence 'I am asleep'. To see the impossibility that the latter should have a descriptive use is to see the impossibility of the alleged observation. Such a claim would be no better than saying that

something happens when he is asleep, although he cannot say at all what the *something is* or justify his calling it an 'observation'.

The proof that the sentence 'I am asleep' cannot have a correct use as a present indicative, amounts to a proof that it cannot express a *possibility*. That one is asleep, or that *perhaps* one is, is not anything one can *think*. In some circumstances *you* can wonder whether *I* am asleep, as you can wonder whether I still exist. In no circumstances can *I* wonder whether *I* am asleep, or be in doubt about it, anymore than I can wonder or doubt whether I still exist.

TWO OBJECTIONS

MY contention that the indicative sentence 'I am asleep' has no sense may appear to be challenged by the fact that its negation 'I am not asleep' does have sense. If the latter has a significant use so must the former, it might be argued. But the general principle that would be assumed has many exceptions. Suppose that a teacher calls the roll every day and when a student's name is called he is required to report his presence by saying 'Here'. When the teacher calls a name without getting a response she writes the words 'Not here' under the name in her roll book. One day the class wit answers 'Not here' and everyone laughs. There is a provision for the use of 'Here' to report one's presence but of course no provision for the use of 'Not here' to report one's absence. The example presents an accurate analogy with our problem. 'I am asleep', said by anyone, has the same absurdity as 'Not here' said by the pupil. Anyone who understands the use of 'Here' cannot suppose that 'Not here' might be a correct response to the calling of his name, even if he said it to himself. Likewise anyone who understands the normal use of 'I am not asleep' cannot think that it would ever be right to say 'I am asleep' even to himself.

'Are you asleep?' has the grammatical form of a question but is not actually used as a question. If you

sâý it to someone your 'question' is answered in the negative if he makes *any* reply at all, even the improper one 'I am asleep'. The purpose of the words 'Are you asleep?' is to find out whether he will *respond*, not to find out *which* response he will make. This purpose is served equally well by softly calling his name; and *that* is not a question. The superficial grammar of the sentence 'Are you asleep' can mislead us into thinking that it is used in the same way that 'Are you hungry?' is used. This can tempt us to think that 'I am asleep' is a possible reply because the 'question' seems to request the one to whom it is addressed to report his present state. The use of the interrogative 'Are you asleep?', one could say, is not to *inquire* but to *test*. It belongs with other tests such as calling the person's name, or lightly touching him, or making some slight noise, the point of which is not to awaken him but to find out whether some reaction will occur which will *show* that he was aware of the sound or touch.

A different objection begins by mentioning the familiar fact that people sometimes wonder whether they are dreaming. Has it not occurred to everyone at some time or other to say 'Am I dreaming?' or 'I must be dreaming?' Does this not show that sometimes we do wonder whether we are asleep or even think we are? And does this not prove that the words 'I am asleep' have sense after all? The reply to this is that we should not be deceived by the look of those sentences but should consider their actual *use*. One says 'Am I dreaming? Isn't this the same town that we drove through an hour ago?'; or 'I must be dreaming! I put my watch down here a second ago and now it

is gone!' 'Am I dreaming?' and 'I must be dreaming' are used as exclamations, expressing sharp surprise at some appearance of things. 'Am I seeing things?' and 'I can't believe my ears!' have the same use. 'Am I dreaming?' no more questions whether the speaker is *asleep* than do these latter sentences. When you say 'Am I dreaming? Isn't this the same town we drove through before?', it would be nothing but a joke if your companion were to reply: 'You are driving the car so I don't think you can be asleep'. The reply is wildly irrelevant, because you are expressing surprise that this town should look just like the one you drove through before, and possibly you are wondering whether it is the same town and you have lost your way, but you are not wondering whether you are asleep.

THE CRITERIA OF SLEEP

IF we were required to find out whether someone is asleep what should we look for? It would be things of this sort: that he is recumbent, his eyes are closed, his breathing regular, his body mainly inert, and that he does not react to various sounds and movements in his vicinity to which he would normally react if awake. If he was whistling, writing, staring at the window, examining a map, or conversing we should not say he was asleep. Our ordinary application of the word 'asleep' is not guided by any consideration of what is going on in someone's cranium, spinal column or other inward parts, but rather by how his body is disposed and by his behaviour or lack of it. Another thing we consider is how *sleepy* he looks and acts when ostensibly waking up from ostensible sleep. We expect him to be somewhat dazed or groggy and not, for a few moments at least, able to perceive and take in things with normal acuteness.

In addition to the above, which we may call the criterion of *behaviour*, there is the criterion of his *testimony*. The latter is not applicable to animals and human infants. Whether a baby or a cat is asleep does not depend on what it will tell you later. But whether an adult person is asleep now may be determined by his being or not being able to report, later on, various

present happenings in his vicinity, e.g. the barking of the neighbour's dog. With adults and older children there are the two criteria of behaviour and testimony; with animals and human infants there is only the one criterion of behaviour. The concept of sleep is not exactly the same in the two cases.

It is to be noted that the criterion of present inertness and unresponsiveness on the one hand, and the criterion of subsequent sleepy behaviour and subsequent testimony on the other, are criteria for propositions that differ in tense. Someone's present recumbent posture, inertness and unresponsiveness is the criterion for saying he *is* asleep. His later sleepiness and inability to give an account of incidents that happened around him is a criterion for saying he *was* asleep. Of course the two sorts of criteria are not independent, for if a person *is* asleep at the present time then it will be true to say later that he *was* asleep at this time. A conflict between the two criteria is possible just because it cannot be true to say now that a certain person is asleep and also true to say later that he was not asleep at this time. That there are two criteria which can conflict does not mean, however, that the concept of sleep is self-contradictory, any more than the fact that there are a plurality of criteria for saying that one thing is *going around* another thing and the fact that they can conflict (as they do in William James's example of the dog and the squirrel) implies that the concept of a thing's going around another thing is self-contradictory.

It may be thought there is really only one *criterion* of whether a person is asleep, namely, his subsequent

testimony. In support of this it might be said that someone may *pretend* to be inert and aware of nothing so that others will suppose he is asleep, but later on he may give an account of happenings at the time (not relying on inference or the testimony of others) thus proving that he was aware of them when they took place and so was awake. Therefore a person's apparent inertness and unawareness would be only an *indication* of his being asleep, which might later be refuted, and not a criterion.

Against this idea is the fact that the criterion of testimony has no application to animals and human infants. With them there is only bodily disposition and behaviour to determine whether they are asleep or not. Undoubtedly this can determine it, for it would be too absurd to say that we never know if a baby or a dog is asleep. It seems most unlikely that what serves as a criterion prior to speech should cease to do so after. If that were so we should have two totally different senses of 'asleep'. Furthermore it is easy to prove that someone's being able or not to relate various things that occurred nearby at a certain time, is not the sole criterion of whether he was asleep at that time. The application of a criterion must be able to yield either an affirmative or a negative result. Now it might happen that a person who was moving about with open eyes and engaged in some activity such as carpentry or painting, was not able a short time later to give any account of anything that went on at that previous time. If 'testimony' were the sole criterion of sleep, then it would have been determined that he was *asleep* at the time he was doing carpentry or painting! This would be a ridiculous result. We

should prefer to say that he was suffering from amnesia at the later time. The facts of the man's bodily state and his activity would have made it certain beyond question that he was *then* awake, which is to say that his bodily state and behaviour is a *criterion* of his being awake or asleep.

It appears that when both criteria are applicable they do not have equal weight, but the criterion of testimony is merely supplementary to the criterion of behaviour, being employed when the casual observation of a person has left some doubt as to whether he is asleep. Suppose there is a heavy rumble of thunder and a man who has been asleep stirs in his bed. But otherwise he appears to be asleep and no further investigation is made. When he gets up a short time later he is asked whether he heard the thunder. If he answers, 'Yes, it was loud, wasn't it?'—or, 'Was that thunder? I thought perhaps it was a heavy truck', then it will have been determined that he was sufficiently awake to hear that sound. If he answers 'No. Did it thunder?', the opposite will have been determined.

That the criterion of behaviour has greater weight can be seen, perhaps, from the following consideration. I think that in a particular case it might be certain beyond question that a man is asleep: his body is relaxed, his eyes closed, he is snoring, he makes no reaction to various movements and voices close by, and he does not even stir when some possessions that he greatly values are noisily destroyed near his bed. 'He slept like a dead man through it all' one would say. Suppose that later on he awakened, i.e. he manifested the normally groggy condition of a

person who gradually awakens from heavy sleep. And now suppose that when he was fully awake he was able to relate what had been said and done in his presence while he was in bed, without either inferring it or being informed of it! Are we to conclude that he was not asleep after all? Suppose he claimed that he had merely pretended to be asleep. But then we want to know why he did not prevent his valuables from being destroyed, for he greatly regrets their loss and could have prevented it easily. Let us suppose he can offer no plausible motive for allowing the destruction to occur. His claim that he *pretended* sleep would be incomprehensible: for if he was not asleep why did he do nothing to protect his belongings? On the other hand what should we make of his ability to relate the incidents that occurred? I do not know *what* we should make of it. The facts would strongly incline me to say that he was asleep when those incidents took place and, therefore, that he is not reporting things he heard and saw. Nor can we say that he is telling a dream, since everything he relates did take place. I think we could not do better than to regard his ability to report those happenings as an extraordinary phenomenon that escapes classification. The interesting point is that although there is obviously a conflict between the two criteria of behaviour and testimony, yet the conflict is not of a sort that would place in doubt the prior conclusion that he was asleep. If this is right the criterion of behaviour has greater probative weight than the criterion of testimony.

PHENOMENA RESEMBLING SLEEP

WHEN something resembles sleep in some ways but in some ways does not, we may be inclined to apply the word 'sleep' to it, thus stretching the use of the term. Is a 'sleep walker' asleep? He exhibits some purposive or quasi-purposive activity, but in an odd trance-like manner. He walks, avoids obstacles and opens doors, yet on awakening he has no recollection of those occurrences. We have an inclination to say he was asleep, for we say 'He walked in his sleep'. At the same time it is an obvious departure from the primary and normal use of 'asleep' to say that a man who is walking about is asleep. If you had the job of putting a baby to sleep you would not be prepared to say that it had gone to sleep as long as it was threshing about in the crib, even if its eyes were closed. You would not feel entitled to announce that it was asleep until it was quite relaxed, nearly motionless, and breathing regularly. To say that a man who is walking is 'asleep' is a new use of the expression. I have read a philosopher's surprising assertion that it is 'merely normal practice' for sleeping persons to lie still, and that they might walk about, shout, talk, or do anything else, and still be asleep. But it is obvious that no one would *teach* the word 'asleep' ostensibly by using examples of people who are shouting or walking.

These cases would be at a considerable distance from the paradigms.

There is an inclination to say that someone in hypnotic trance is asleep. He can answer questions and respond to commands and suggestions, and these reactions show that he is *not* asleep in the primary or basic use of the word 'asleep'. Nor would a man who was tossing about, crying out and groaning in the throes of a nightmare, be a good example of a person asleep. Those violent movements and sounds and the appearance of mental agitation diverge too far from the criterion of behaviour previously mentioned. (There is another use of the word 'nightmare' in which our sole criterion that someone had a nightmare is that he tells a very unpleasant dream on awaking. In this sense of the word his sleeping state may have perfectly satisfied the criteria mentioned in Chapter 6, and so there would be no stretching of the word 'asleep' to say that he had a nightmare when he was asleep. Notice that in this use the criterion is for saying he *had*, not *is* having a nightmare.)

To say that a sleep walker, a person in hypnotic trance, and someone having a violent nightmare is 'asleep', is to make a natural extension of the use of that word beyond its primary use. It is not surprising that an expression used to name a certain phenomenon should come to be applied to other phenomena that resemble it more or less. But it may be useful to be reminded of it, so that our attention in this investigation will not be diverted from the normal phenomenon of sleep.

SOUND ASLEEP

BETWEEN the two poles 'awake' and 'asleep' there is much room for qualification. If you were supposed to report whether someone is asleep it might be that what you observed would not be appropriately reported either by 'He is awake' or 'He is asleep'. To say either thing might be misleading or even inaccurate. The following might be better descriptions: 'It's a restless sort of sleep; he is tossing about'; 'He's having a nightmare. He mutters "Don't hit me!" and whimpers as if frightened'; 'He seems to be asleep yet on the other hand the light appears to bother him. He tries to shield his eyes'. In observing this person one would use what I called the criterion of behaviour. Someone who is tossing about or trying to shield his eyes does not perfectly satisfy it. But in practice we should not refuse to apply the word 'asleep'. What we do is to make a *qualified* assertion that he is asleep. Aristotle says:

Some persons [when asleep] actually, in a certain way, perceive sounds, light, savour, and contact; feebly, however, and, as it were, remotely. For there have been cases in which persons while asleep, but with the eyes partly open, saw faintly in their sleep (as they supposed) the light of a lamp, and afterwards, on being awakened, straightway recognized it as the actual light of a real

lamp; while, in other cases, persons who faintly heard the crowing of cocks or the barking of dogs identified these clearly with the real sounds as soon as they awoke. Some persons, too, return answers to questions put to them in sleep. For it is quite possible that, of waking or sleeping, while the one is present in the ordinary sense, the other also should be present in a certain way (Aristotle, 462a).

I do not disagree with these remarks. What needs some explanation is the statement that when sleep is present 'in the ordinary sense' waking may be present 'in a certain way'. What this amounts to is that when the normal criteria of sleep are not completely satisfied we are not always ready to declare that the person is not asleep. We do not use the word 'asleep' so rigorously as that. Instead we say he is 'asleep' and at the same time try to indicate how his condition fails to be a perfect example of sleep, by means of characterizations like 'restless' or descriptions like 'He mutters when the dog barks'. What we do is to modify or reduce the assertion that he is asleep. It is as if we first asserted that he is asleep and then added a modifying clause like 'but he is moaning', the effect of which is to subtract something from the assertion. Just as we might report the distance in miles to a certain destination by giving first a number greater than the actual and then subtracting a number large enough to yield the true figure. The statement 'Although he was asleep he answered my question as to the whereabouts of the keys' does the job, we could say, both of asserting that the person is asleep and of qualifying or reducing that assertion. A man who is shielding his eyes from the light, standing up or answering a question is *in those respects* not asleep.

But he may satisfy so well the other requirements of the criteria of sleep that we are strongly inclined to say he is asleep. Aristotle's comment that it is possible for a person to be both awake and asleep ('in a certain way') has the justification that we are often ready to apply the expression 'is asleep' to someone whose condition largely satisfies the criteria of sleep but in some respects does not.

One kind of employment that the sentence 'He is *sound* asleep' has is to make an *unqualified* assertion that the person referred to is asleep. In this use its meaning is that the criteria of inertness, unresponsiveness and so forth, are satisfied as well as can be—in short, that he is a perfect example of a person asleep. Being sound asleep, in this sense, is not undergoing a special kind or a superlative degree of sleep. It is just being asleep, without qualification. In this sense of the words it would be wrong to say that a man is sound asleep if he appears to be bothered by the light or the barking of dogs, if he is answering a question or threshing about. These pieces of behaviour would keep his case from being an ideal example of a person asleep. If he testified on awaking that he had been dimly aware of the crowing of cocks then it would be wrong to say he was sound asleep when he heard this sound. It is all right, although possibly misleading philosophically, to say 'He faintly heard the crowing in his sleep'.

We also use 'He is sound asleep' in a narrower sense to mean that it is or will be *difficult to waken* the person referred to. If you shake him but do not succeed in arousing him, you may say 'My, he is sleeping soundly!' It is possible that a person who is not sound asleep in

the first sense (e.g. he is walking in his sleep) should be sound asleep in the second sense, and also the reverse of this is possible. Indeed, psychological experiments appear to show that the latter is actually so. 'The most quiet sleeper, on the average, required the least intensity of sound to awaken him' (Kleitman, p. 145). A person who is sound asleep in the first sense will in general not respond to or have any recollection on awaking, of moderate sounds in his vicinity. Yet there may be some specific slight or moderate sound that will waken him, e.g. the whispered words 'Time to get up'. There is an inclination to think that a person can be wakened in this way only if he is *already* partly awake, since he appears to be *discriminating* between sounds. He makes no reaction to the sounds of trucks, telephones and vacuum cleaners but he does respond to some whispered words. It looks as if he *heard all* of the sounds and *chose* to react to some but not to others. But this inclination is in error: the criteria for his having heard the other sounds—namely, his behaviour and testimony—are not satisfied. It is just a fact that a person who is sound asleep and therefore generally unaware of moderate noises and movements in his vicinity, can sometimes be wakened by some particular slight noise such as the baby's whimpering.

The meaning of 'sound' when it modifies the predicate adjective 'asleep' should not be confused with its meaning when it modifies the noun 'sleep'. To say 'I had a sound sleep' commonly means that my sleep *refreshed* me—that it was a *good* sleep. It is a report based on how I feel *after* my sleep. A person whose state satisfied completely, for several hours, the criteria of sleep and was, therefore, sound asleep

during that time, may not have had a sound sleep. He may awake feeling quite exhausted and if so he will not say that he had a good or sound sleep. And if he had a very *unpleasant* dream he would not say that he had a sound sleep: whereas he could say this if he had a pleasant dream. To say 'I had a sound sleep' is to say that one's sleep was refreshing and left an agreeable impression. A man's own statement is decisive for the determination by others of whether he had a sound sleep. One cannot say 'I *must* have had a sound sleep': this is not something one *infers*. But 'I must have been sound asleep when John entered the room' makes good sense as an inference from the information that John entered the room and the fact that one has no recollection of it.

Another possible source of confusion should be mentioned. It can be true that a man was asleep the whole afternoon and yet also true that at various times during the afternoon he was awake and at other times nearly asleep but not fully asleep. If someone wants to know what *A* is doing now one might reply with truth that *A* is asleep upstairs, although at the moment of speaking *A* is merely dozing or is perhaps even fully awake. The point is that there is a use of 'is asleep' that might be called 'dispositional'. To say in this sense that someone is asleep (is sleeping) this afternoon is to tell how he is disposed for the afternoon and not to tell what his actual state is at the moment of speaking. This is analogous to the use of 'He is sawing wood' to tell how a man is engaged for the day, although at the moment of speaking he may be mopping his brow and not sawing. If *A* lay down with the purpose of sleeping all afternoon, and if the

criteria of sleep were fulfilled in his case for nearly all the time he was lying down, although for short periods they were not, it would be in accordance with ordinary usage to say that *A* was asleep the whole afternoon. The more fundamental sense, however, of the sentence 'He is asleep' is when it means that the person referred to is asleep at the moment of speaking. It is this use of the words that is governed by the criteria mentioned in Chapter 6, and to which the thesis of Chapter 3 refers.

JUDGMENTS IN SLEEP

I RETURN now to the main course of my argument from which I digressed after Chapter 4. We saw that the sentence 'I am asleep' cannot be used to make an informative statement to others nor to say something significant to oneself. As an indicative sentence it is without sense and necessarily so. It ought not to be supposed that what has been shown is merely that there is something queer about the words 'I am asleep' which keeps them from expressing a judgment—and that it is *possible* to judge that oneself is asleep. For what is the description of this possible judgment? The judgment that would be expressed by the words 'I am asleep' *if* those words had sense? That is not a description of a judgment. No. The result obtained is that the very notion of such a judgment is absurd. The absurdity comes down to this, that for the judgment to be *true* the person who made it would have to be asleep. The fact which we noted, that there could not be a criterion for the correct use of the words 'I am asleep', depends on that: for to know that a person uses those words correctly we should sometimes have to observe him judging that he is asleep *while* he is asleep. And that is the absurdity.

Arguing from the impossibility of judging that one

is asleep we arrive at an important result, namely, that it is nonsensical to suppose that while a person is asleep he could make *any* judgment. Remember that the logical absurdity detected in the sentence 'I am asleep' amounts to this: that in order for the sentence to have a *correct* use one would sometimes have to say it when the thing one said was *true*. We noticed that it would be self-contradictory to *verify* that a man was both asleep and judging that he was, because whatever in his behaviour showed he was making the judgment would equally show he was not asleep. Now this would be so *whatever* the judgment was. In order to know that he had made any judgment one would have to know that he had said certain words and that he had been aware of saying them. But whatever it was in his demeanour that revealed his awareness of saying them would also establish that he was not asleep. To verify that he was both asleep and making a judgment one would have to verify that he was both aware and not aware of saying certain words. It would not matter whether the words were 'It is raining' or 'My wife is jealous' or any other words. It would be self-contradictory to verify that he made *any* judgment while asleep. It is not that there is something unique about the fact of being asleep that keeps one from taking note of *that* fact while asleep. If a sleeping person could note that it is raining or judge that his wife is jealous, then why could he not judge that he is asleep? The absurdity of the latter proves the absurdity of the former.

It could be objected that my argument has shown merely that the *verification* that someone is both asleep and judging is self-contradictory, not that his *being* both asleep and judging is self-contradictory. This is

true. The latter notion is not self-contradictory (in the sense of entailing both of a pair of contradictory propositions). But it is senseless in the sense that nothing can count in favour of either its truth or its falsity.

Let us consider whether there are any possible ways in which it could be established that a man made some judgment while asleep. First, it could not be established through anyone's observation that he was at the same time asleep and making a judgment. The criteria for saying that someone is making a judgment and for saying that someone is asleep cannot be simultaneously satisfied in the case of one and the same person. In the second place, let us consider whether any reliance could be placed on the sleeper's testimony after awaking. He must be imagined to testify that he made some judgment or other while asleep. The important question is how could he *know* that it was *while he was sleeping* that he made the judgment? Difficulties present themselves here that make it quite unlike knowing that one made a certain judgment while one was, say, driving through Chicago. It will be necessary to examine several cases.

(1) He says he was *aware* of being asleep at the time he made the judgment (as he might say that he *saw* it was Chicago that he was driving through). But this is impossible. For if he could have been aware of being asleep he could have made the judgment 'I am asleep', and we have seen that there is no such judgment.

(2) He does not make the nonsensical claim that he was aware of being asleep, but declares instead that

he *infers* he was asleep when he made the judgment. What would be the *data* for this inference? There appear to be several possibilities here:

(a) Suppose he says that he made the judgment at the same time that some publicly perceived event occurred, e.g. thunder. Suppose also that another person who was observing him at the time of the thunder had thought he was asleep. Could it be correctly inferred that he made the judgment while asleep? No. His testimony implies that he heard the thunder, and the conclusion to be drawn is that he was not fully asleep when it thundered, not that he made a judgment while fully asleep.

(b) Suppose he says he made the judgment but he knows that he did not make it either before he went to sleep or after he awakened. He must, he concludes, have made it while asleep. Suppose that the judgment is that his friend, Smith, has artistic talent. Now could it not be that his impression that he made this judgment is *false*? There may be no doubt that *now* he is of the opinion that Smith is talented. And possibly it could be established that he did not think this before going to sleep, and did not *arrive* at that opinion, either suddenly or gradually, after awaking. But it would not follow that he *arrived* at it *before* awaking. It would sufficiently describe the facts to say that when he went to sleep he was not of that belief, but that he *awoke* with the belief that Smith is talented. The inference to an intervening judgment is not required. To consider an analogous case, if before he went to sleep he was *undecided* about some important

matter but when he awakened his mind was made up, it would not follow that sometime during the night he *made* the decision. It would be enough to say that he went to sleep undecided and awoke decided. To take another example, if he was seeking the solution of a certain problem in geometry, say, before he went to sleep but failed to obtain it, and then when he woke up he had the solution, it would not follow that the solution had *come* to him while he was asleep. It could be a satisfactory description to say that he had no solution when he went to sleep and did have one when he woke up. The man's conclusion, therefore, that he made the judgment while asleep is not established by his impression that he made it, together with his knowledge that he did not make it while awake. First of all the conclusion does not follow, and in the second place it is a kind of conclusion whose truth or falsity would be theoretically unverifiable.

(c) Suppose the man says that at the time he made the judgment he was having a certain experience that occurs when he is asleep and only when he is asleep; therefore he was asleep when he made the judgment. He could hardly maintain that the experience referred to is one that *necessarily* occurs whenever he is asleep. For sleep *qua* sleep has no experiential content: it cannot turn out, as remarked before, that a man was not asleep because he was *not* having some experience or other. Let us suppose his claim is that, as a matter of contingent fact, the experience sometimes occurs when he is asleep and never occurs except when he is asleep.

But how can it be verified that this experience ever does occur while he is asleep? We encounter in a different place the very problem to be solved. If, for example, the alleged experience was one of being afraid of something, there would have to be some outward expression of fear on his part in order for it to be verified by someone's observation that he was afraid. If some genuine expression of fear does occur we have to *qualify* the claim that he was asleep at that time. If his condition resembled normal sleep in other respects we may *say* 'He was frightened in his sleep', but nonetheless we are denying that he was fully asleep. If in addition to the occurrence of facial expressions, gestures and utterances of fear he declared, when fully awake, that he had been afraid of something 'in his sleep', this testimony would be in agreement with his previous behaviour and the case would be even stronger for saying that he was not fully asleep when the expressions of fear occurred. In order to produce a case in which it could be maintained, without qualification, that he was asleep and yet had a certain experience, it would be required that we should be presented with nothing but his testimony that he had this experience while asleep—testimony unsupported by any outward behaviour during the night. Thus there recurs the same difficulty about verification that we encountered in (b) above. His apparent recollection, no matter how vivid, of some experience supposedly occurring during sleep, cannot be confirmed. Whether his recollection is true or false is theoretically undecidable. Therefore his assertion that he made some judgment during

sleep would be in no way supported by his claim that he made it at the same time he had some experience which is supposed to occur only in sleep.

(d) Let us suppose him to claim that he had a dream and that he made the judgment that Smith has artistic talent at the same time he was dreaming. Therefore, he concludes, he made that judgment while asleep. I will not raise the question 'How does he *know* he dreamt while he was *asleep*?', for we are concerned with a use of the word 'dream' in which dreams, when they occur, *can* occur only in sleep. Nor will I raise the question 'How does he know he had a dream?', for there is a sense, as we shall see, in which we do not expect a man to be able to give grounds for his assertion that he dreamt. But I will ask 'What does he mean by saying that he made a judgment *at the same time* he was dreaming?' Does he mean 'at the same time' in objective, physical time? As measured, for example, by the clock or the rising of the moon? If so, what possible grounds could he have for his assertion? If what he is saying is that his judgment that Smith is talented was *part* of his dream, that is all right. But then the sentence 'In his dream he decided that Smith is talented' has nothing like the same meaning that the sentence, 'He decided that Smith is talented', has in its normal use.

Or he might not wish to say that his judgment that Smith is talented was a part of his dream in the sense of being one of the more or less connected series of incidents that composed his dream. People often report that while they were having a certain

dream they 'realized' they were dreaming, and they do not mean that this realization was itself a part of their dream: rather, they wish to distinguish between the dream and the judgment or realization that it was a dream, although they wish to say that the realization occurred *at the same time* the dream occurred. So it might be that a man reported that *while* he was having a certain dream it occurred to him that his friend, Smith, is artistically talented. If asked how he *knows* that the judgment occurred *while* he was dreaming he would say that he just does know it: 'I distinctly recall that I came to that conclusion about Smith at the same time I was having a dream'. But now we have to put the previous question, namely, what could possibly verify this impression of his as true? Clearly nothing could. If the speaker understands that this is so but still wishes to make the above assertion, then he knows and we know that his assertion is one to which the notion of verification is not applicable, but is supposed to be true by virtue of the speaker's mere say-so. It is the same *kind* of statement as those that compose his account of his dream, e.g. 'In my dream I saw the woods burst into flame and at the same time I heard a sound like thunder', and it cannot be that such a statement asserts the simultaneity of two events in physical time. The only sense, therefore, that could be given to someone's declaration that he made a certain judgment while he was dreaming would be a sense that would confer on his declaration the same logical status that is possessed by statements composing the account of a dream. And the latter, as we shall see,

are not to be understood as asserting the occurrence of any events in physical time. If a man tells us that he made a certain judgment about Smith while he was shaving, he relates his judgment to an event in physical time. If he says that he made that judgment while dreaming he does not relate his judgment to an event in physical time, any more than he does if he says he made it *in* a dream. In neither case would he be asserting that at some time or other he made a certain judgment.

(3) Finally, no physiological phenomena will be of any use as evidence that a man made a judgment while asleep. If it were established, for example, that whenever a person makes a judgment the electrical output of a certain region of his brain rises or falls in some characteristic way, the occurrence of this electrical phenomenon in a sleeping person would not provide any probability that the sleeper was making a judgment. The imagined correlation would, of necessity, have been established only for the case of people who were awake, since the criteria for saying some person made a judgment could not be fulfilled when he was asleep. The attempt to extend the inductive reasoning to the case of sleeping persons would yield a conclusion that was logically incapable of confirmation. It would be impossible to know whether this conclusion was true or false.

In this Chapter I have considered a number of ways in which it might be supposed that it could be established, at least with probability, that some person made a judgment while asleep. Perhaps still other ways of attempting this could be imagined, but I

daresay they would prove equally barren. The fundamental point, I think, is that we are quite unable to provide a description of what the facts might be that would establish with certainty that someone made a judgment while asleep. It is easy to see that a person, *A*, could not by observing a person, *B*, simultaneously verify that *B* was both asleep and making a judgment. We are more tempted to think that a direct verification could be obtained through *B*'s testimony after waking, namely, his honest avowal that he did make some judgment or other while asleep. Our inclination is to suppose that *he* could have been *aware* of being asleep: this is what leads us to suppose that his testimony could provide a direct verification. But we have seen that this is wrong, and that his claim that he made a judgment while asleep would itself have to be the result of an inference. When we try to appraise various attempts at inference we always run into the difficulty that we do not know what the goal of the inference is, because we are not in possession of any criterion for saying that a man made a judgment while asleep, although we have criteria both for saying that a man made a judgment and for saying that a man was asleep. Since we do not understand what the facts would have to be in order for it to be true that someone made a judgment while asleep, it is a forgone conclusion that any attempt to 'infer' that unintelligible state of affairs, if only with probability, will get nowhere.

APPLICATION TO OTHER MENTAL
PHENOMENA

THE argument just gone through in Chapter 9 applies to an indefinite number of kinds of mental acts and psychological states and occurrences. As stated there it referred only to judging. But with appropriate changes it can be applied to thinking, reasoning perceiving, imagining or questioning. What we have is a schema of proof which, by proper substitutions, can be made into a proof that thinking in sleep, reasoning in sleep, imagining in sleep and so on, are all unintelligible notions. The things just mentioned are all examples of mental *activities*, but this is not essential to the proof. It works just as well for 'passivities' like fear, anxiety, joy; illusions and hallucinations; and imagery.

Let us take the example of *imagery* and run through the argument. How could it be established that a person had mental imagery while asleep? Not by another's observation that he is fully asleep and also that something in his behaviour or utterances shows that he is experiencing imagery: the two observations would be in contradiction. Let us resort to his testimony after waking. He must be supposed to declare that he had images while asleep. We encounter the problem, How can he *know* that he had images while *asleep*?

(1) He cannot claim that he was *aware* of being asleep when he had the imagery.

(2) He may be supposed to *infer* that he was asleep when he had the images. Consider the following attempts at inference:

(a) He says that he experienced the imagery at the same time that thunder occurred; to someone else observing him at that time it appeared he was asleep; he infers that he had images while asleep. But this is wrong because his testimony that he heard the thunder establishes that he was not fully asleep at the time.

(b) He says that he had certain imagery but he knows that he did not have it either before he went to sleep or after he awakened, and so he infers he had it while asleep. But perhaps he is only under the *impression* that he previously had certain images. Perhaps he merely awoke with a false belief that previously he had experienced various images which, he can now describe. His present impression of having had those images before does not *require* that in actual fact he did have them before. And since he claims he had them while asleep there could be no possible verification of his claim.

(c) He says that he had the images at the same time he had some other experience which, as a matter of contingent fact, he has only when asleep, and he infers he was asleep at the time. But this merely puts the difficulty in another place, for

there is no way of verifying his impression that the other experience occurred during sleep.

(d) He says he had the images at the same time he was dreaming and therefore while he was asleep. If he means 'at the same time' as might be determined by some physical measure then his claim is necessarily unverifiable. If he means that he had the images *in a dream* then there is no objection. No question arises as to whether his impression may be false or his memory deceives him. But then he is not making the same sort of assertion he would make if he said that while he was reading a book or talking to a friend such and such images came to him. For in the latter case he would be implying that at a definite location in physical time he was aware of certain images. But when he says he had images in a dream, he does not imply that those images had a location in physical time. His avowal belongs to 'telling a dream' and we shall see (Chapter 13) that to tell a dream is not to assert that certain events occurred in physical time. If he says the images were not part of his dream but were experienced by him *at the same time* he dreamt, he cannot mean 'at the same time' in physical time. His assertion has the same status as his report that a certain pair of incidents occurred 'at the same time' *in his dream*. Although it does not relate an incident of a dream, it has the logical nature of dream-telling statements.

(3) Finally, for the reasons given in the previous section, no legitimate inference could be made from

the occurrence of a certain physiological phenomenon in a sleeping person to the occurrence of imagery.

The above reasoning yields an identical result when applied, *mutatis mutandis*, to illusions or hallucinations or sensory impressions, or to any other psychological events, with the sole exception of *dreams*. I proceed to discuss the latter.

DREAMING AS AN EXCEPTION

THERE is a use of the word 'dream', and it is the basic sense of the word, in which a person cannot dream unless he is asleep. The criterion of someone's having had a dream, in this sense, is that upon awaking he tells a dream. It is possible for a person to fall asleep and to sleep soundly for an hour, and then, after being suddenly awakened, to tell a dream. The various criteria of sleep that were previously mentioned could be perfectly satisfied, so that there would be no question that he had been sound asleep during that hour. But the criterion of his having dreamt would also be satisfied. It makes sense, therefore, to say of someone both that he was sound asleep for an hour and that he dreamt during that sleep.

Aristotle says that a dream is a kind of illusory sense-presentation occurring in sleep (Aristotle, 459a, 460b, 462a). Descartes thought that in dreaming we reason and judge in exactly the same sense that we do when awake. Hobbes believed that dreams are 'the imaginations of them that sleep' (Hobbes, Pt. I, Ch. 2). Other philosophers think that dreaming is having images or even hallucinations in sleep.

These opinions can be seen to be mistaken. The argument of Chapters 9 and 10 shows, I think, that the idea that someone might reason, judge, imagine,

or have impressions, presentations, illusions or hallucinations, while asleep, is a meaningless idea in the sense that we have no conception of what could establish that these things did or did not occur. We know perfectly well, however, what establishes that a person dreamt while he slept—namely, his telling a dream. This clear difference in possibility of verification shows that dreams are none of the things that philosophers have commonly supposed them to be.

It is easy to see that the schema of proof of Chapter 9 does not apply to dreams. Let us consider someone's avowal that in his sleep he had a dream. When we scrutinized the apparently parallel claim that in his sleep he made a judgment or imagined something, and so on, the question always facing us was 'How could he *know* that the thing in question happened in his *sleep*?' An answer could not be made out. With dreams the same question cannot arise. If someone tells us that in his sleep he had a dream, we cannot ask 'How does he know that the dream occurred in his *sleep*?' In the sense of 'dream' that concerns us (we are not considering day-dreams) if a man had a dream it follows he was asleep. The above question could not be asked, therefore, without absurdity. But if a man made a judgment, did some reasoning, was struck by a thought, or had some imagery, it certainly does not follow that he was asleep. With these things, therefore, there is a place for asking 'How does he know it happened while he slept?'; in the case of dreams there is not. There is a respect in which it makes sense to ask 'How does he know that he *dreamt*?' (not 'How does he know that he dreamt while *asleep*?'). For sometimes a man may wake up with the impression

that certain incidents occurred and may be in doubt as to whether those incidents belonged to a dream or to reality. To find out that it was a dream is to find out that those incidents did *not* occur. To learn, in this sense, that a certain event occurred in a dream is not to learn that the event took place while one slept, but just the reverse, namely, that the event did not take place at all—which shows how misleading is the form of words ‘It occurred in a dream’.

Many philosophers and psychologists have thought that when one dreams one reasons, judges, imagines, has sense-impressions, and so on, while asleep. They have thought that to dream is to do those acts or have those experiences in the *same* sense that people do them or have them when awake. There may be differences in degree of clarity, intensity or coherence, but that is all. ‘What we remember in dreams we do really remember’ (Russell: see Chapter 1). ‘To say that one dreams is to say that one sees, hears, touches, etc., while asleep’; ‘If anyone dreams that he believes, expects, desires, etc., then he really does’ (Yost & Kalish: see Chapter 1). The preceding argument has, I believe, proved this common philosophical view to be false. If it is theoretically impossible to verify that someone had images, say, in his sleep, but possible to verify that he dreamt, then a dream cannot be identical with, nor composed of, images experienced during sleep. The same result holds if for ‘images’ we substitute ‘impressions’, ‘thoughts’, and so on through an indefinite number of psychological nouns. If a man had certain thoughts and feelings in a dream it no more follows that he had those thoughts and feelings while asleep, than it follows from his having climbed

a mountain in a dream that he climbed a mountain while asleep.

I was inclined at one time to think of this result as amounting to a proof that dreaming is not a mental activity or a mental phenomenon or a conscious experience. But now I reject that inclination. For one thing, the phrases 'mental activity', 'mental phenomenon', 'conscious experience', are so vague that I should not have known what I was asserting. Reading aloud is an activity but is it a mental activity, or a mental phenomenon, or a conscious experience? I do not know. For another thing, a good many philosophers tend to use these phrases more or less as technical expressions, and they would be inclined to *stipulate* that dreams are mental phenomena or conscious experiences. If a philosopher uses the phrase 'mental phenomenon', say, in such a way that dreams are mental phenomena *by definition*, then obviously no argument is going to prove to him that they are not. I avoid this way of stating the matter. What I say instead is that if anyone holds that dreams are identical with, or composed of, thoughts, impressions, feelings, images, and so on (here one may supply whatever other mental nouns one likes, except 'dreams'), occurring in sleep, then his view is false. Someone who accepts this result may still have a use for classifying dreams as 'mental phenomena'. He might wish to emphasize the fact that our main source of information about peoples' thoughts, feelings and impressions are their own reports, and that this is exclusively so in respect to their dreams. And someone may have as his grounds for classifying dreams as 'conscious experiences' the fact that we

speak of 'remembering' dreams, or the fact that in telling dreams we say that we 'saw' and 'heard' various things. There is nothing wrong with these decisions, if they do not cause one to be misled in other respects.

THE CONCEPT OF DREAMING

WHERE does the concept of dreaming come from? We are strongly inclined to think of dreaming as an inward state or process of the soul, and to suppose that each of us arrives at the concept of dreaming through taking note of the process in himself. But this idea gives rise to insoluble problems. For one thing, how could it be determined that the inner states of different people were the *same* and, therefore, that they meant the same thing by the word 'dreaming?' Even more serious, how could one know that the inner state one calls 'dreaming' is the same in oneself each time? Perhaps there is not enough regularity in one's application of the sound 'dreaming' for it to even qualify as a *word*! An appeal to one's own memory impression of its being the same state each time would be useless, because there would be no possibility of one's determining whether this impression was true or false. I am applying to dreaming the points made by Wittgenstein in his attack on the notion that one learns what thinking, remembering, mental images, sensations, and so on, are from 'one's own case'.¹

¹ For an explanation of these points readers may care to refer to my review of the *Philosophical Investigations* (*Philosophical Review*, October, 1954) and to my article 'Knowledge of Other Minds' (*Journal of Philosophy*, November, 6, 1958 Vol. LV, No. 23.)

One may think to overcome these difficulties by allowing that the *descriptions* that people give of their private states provides a determination of what those states are and whether they are the same. But if one takes this line (which is correct) one cannot then permit a question to be raised as to whether those descriptions are in error or not—for this would be to fall back into the original difficulty. One must treat the descriptions as the *criterion* of what the inner occurrences are. 'An "inner process" stands in need of outward criteria' (Wittgenstein, § 580).

What we must say, although it seems paradoxical, is that the concept of dreaming is derived, not from dreaming, but from descriptions of dreams, i.e. from the familiar phenomenon that we call 'telling a dream'. If after waking from sleep a child tells us that he saw and did and thought various things, none of which could be true, and if his relation of these incidents has spontaneity and no appearance of invention, then we may say to him 'It was a dream'. We do not question whether he really had a dream or if it merely seems to him that he did.

People who on waking tell us certain incidents (that they have been in such-and-such places, etc.). Then we teach them the expression 'I dreamt', which precedes the narrative. Afterwards I sometimes ask them 'did you dream anything last night?' and am answered yes or no, sometimes with an account of a dream, sometimes not. That is the language-game . . .

Now must I make some assumption about whether people are deceived by their memories or not; whether they really had these images while they slept, or whether it merely seems so to them on waking? And what meaning

has this question?—And what interest? Do we ever ask ourselves this when someone is telling us his dream? And if not—is it because we are sure his memory won't have deceived him? (And suppose it were a man with a quite specially bad memory?—) (Wittgenstein, p. 184).

That this question is not raised is not a mere matter of fact but is essential to our concept of dreaming. If someone questioned whether there really are dreams corresponding to peoples' reports of dreams presumably he would have some idea of what would settle the question. He would not be using the report of a dream as the criterion of what the dream was, and so he would have to mean something different by 'dreaming'.

Assuming that dreams can yield important information about the dreamer, what yielded the information would be truthful accounts of dreams. The question whether the dreamer's memory deceives him when he reports the dream after waking cannot arise, unless indeed we introduce a completely new criterion for the report's 'agreeing' with the dream, a criterion which gives us a concept of 'truth' as distinct from 'truthfulness' here (*Ibid.*, pp. 222-223)

We speak of 'remembering' dreams, and if we consider this expression it can appear to us to be a misuse of language. When we think philosophically about memory the following sort of paradigm comes most naturally to our minds: I spoke certain words to you yesterday. Today I am requested to give an account of what those words were. The account I give is right or wrong. This is determined by whether it agrees with your account and that of other witnesses, perhaps also by whether it is plausible in the light of

what is known about you and me and the circumstances yesterday, and perhaps by still other things. But when I speak of 'remembering' a dream there is nothing outside of my account of the dream (provided that I understand the words that compose it) to determine that my account is right or wrong. I may amend it slightly on a second telling—but only slightly. If I changed it very much or many times it would no longer be said that I was 'telling a dream'. My verbal behaviour would be too unlike the behaviour on which the concept of dreaming is founded.¹ That something is implausible or impossible does not go to show that I did not dream it. In a dream I can do the impossible in every sense of the word. I can climb Everest without oxygen and I can square the circle.² Since nothing counts as determining that my memory of my dream is right or wrong, what sense can the word 'memory' have here?

But of course it is no misuse of language to speak of 'remembering a dream'. We are taught this expression. Only we must be mindful of its actual *use* and of how sharply this differs from the use of 'remembering' that appeared in our paradigm. Failure to observe this results in such an argument as the following:

¹ We are told that a patient under psychoanalysis may radically revise his first account of a dream, after six months of treatment. Because this reaction is so dissimilar to the normal phenomenon of telling dreams it is better, I think, to say that in psychoanalysis there is a different concept of dreaming than to say that in psychoanalysis one finds out what one really dreamt.

² What would be more senseless than to suppose that someone should not be able to distinguish propositions from tables? But Moore had a dream in which he could not do this. See J. M. Keynes, *Two Memoirs* (Hart-Davis, 1949), p. 94.

Dreaming is a real experience. And since dreams can be remembered they must be conscious experiences. Just as it is correct to say that a dreamer really dreams and does not merely dream that he dreams, so it is correct to say that a dreamer is really aware of the contents of his dream and does not merely dream that he is aware of them (Yost & Kalish; see Chapter 1).

I do not understand what the first statement ('Dreaming is a real experience') could mean other than that people really do have dreams—which is undeniable. A philosopher has spoken of 'the theory that we don't dream, but only remember that we have dreamt' (Manser, pp. 226-227), but if there is this 'theory' it must result from confusion about the criterion of dreaming. The second statement in the argument above ('And since dreams can be remembered they must be conscious experiences') seems to embody the mistake of supposing that all uses of 'remembering' conform to the same paradigms. If I remember today how someone flapped his arms yesterday, then yesterday I must have been aware of the flapping arms. Does it follow that if I remember today a dream of last night, then last night I must have been aware of the dream or of its 'contents'? First, there is no warrant for thinking that 'remembering a dream' carries exactly the same implications as 'remembering a physical occurrence'. Next, considering the impossibility of establishing that someone was aware of anything at all while asleep and the possibility of establishing that he dreamt, how can it *follow* from his remembering a dream that he was aware of the dream when he dreamt it? Finally and most importantly, what is the *meaning* of this philosophical claim?

(For it does not appear to be a mere decision to call dreams 'conscious experiences' because we speak of 'remembering' dreams). What would be one's criterion for saying that a sleeper is aware of his dream? I do not see what it could be other than his telling a dream on waking up. If that is what it is then the use of the philosopher's sentence, 'People are aware of their dreams', is the same as the use of the sentence, 'People have dreams'. Consequently the philosophical claim, 'When people dream they are aware of their dreams' (or: 'Dreams are conscious experiences'), says absolutely nothing.

I know one wishes to make this protest: 'To say that one dreamt is not just to say that, on waking, one has the impression of having dreamt. No: one means that, over and above the impression, a dream was really there!' One might add: 'The impression comes to one when awake but the dream occurred during sleep; therefore they cannot be the same'.

But I am not trying to maintain that a dream *is* the waking impression that one dreamt. This would be self-contradictory. Indeed I am not trying to say what dreaming *is*: I do not understand what it would mean to do that. I merely set forth the reminder that in our daily discourse about dreams what we take as determining beyond question that a man dreamt is that in sincerity he should tell a dream or say he had one.

It is not easy to understand the relation between dreams and waking convictions of having dreamt. The dream and the waking conviction are not one and the same thing, in the sense that the morning star and the evening star are one and the same. Are they *two*

things, numerically different? Let us say so. Then the question is: How are these two things related? Can we say they are logically independent of each other in the sense that either could exist regardless of whether the other existed? Now it is possible to think of a case in which a man believes falsely that he did not dream: e.g. he woke up in the middle of the night and told a dream to someone, but on waking in the morning he has the impression of having had a dreamless sleep. The possibility of this case, however, does not prove the logical independence of dreams from waking impressions, because here we relied on his telling a dream in the night as establishing that he dreamt. If we try to suppose that mankind might have told dreams without ever having dreams, or might have had dreams without ever having told dreams, we are in an embarrassment as to what would establish the existence of a dream. We may say that dreams and waking impressions are two different things: but not—two logically independent things.

One cause of difficulty is a temptation to think that when one states the criterion for something one says what that something *is*—one *defines* it. But this is wrong. The criterion of someone's having a sore foot is what he does and says in certain circumstances: and *that* is not a sore foot. Considering this, one may be inclined to think that there cannot be a *criterion* (something that settles a question with certainty) of someone's having a sore foot or having dreamt, but merely various 'outer' phenomena that are empirically correlated with sore feet and dreams. This view, however, is self-contradictory: without criteria for the occurrence of these things the correlations could not

be established. Without criteria the sentences 'His foot is sore', 'He had a dream', would have no use, either correct or incorrect. We must admit that there is a criterion for the use of 'He dreamt' and also admit that it does not tell us what a dream *is*, does not give the 'essence' of dreaming (whatever that might mean), but gives the conditions that determine whether the statement 'He dreamt' is true or false.

Our puzzlement over the criterion of dreaming is partly due to the fact that the sentence for which we want a criterion is in the *past* tense. How can a present occurrence, a person's telling a dream, be the criterion for something that happened previously, the dream? Well, why not? If we abandon the assumption that the criterion and the something of which it is the criterion must be identical, then why cannot a present occurrence be the criterion of a past occurrence? We feel a reluctance to admit that this can be so, and we incline towards the thought that the criterion of the occurrence of a dream is to be found in some behaviour, or in some physiological process, that is supposed to be simultaneous with the dream. This reluctance is largely due, I think, to the assumption just mentioned. But a contributing factor is a certain haziness that is present on the periphery of our ordinary discourse about dreams. I will explain this.

If a young man in love utters his sweetheart's name in his sleep and smiles and sighs, it would be natural for anyone to say 'He is dreaming about his sweetheart'. But how should we be using this sentence? I mean: should we be predicting that if he were awakened he would be able to relate a dream or at least say he had one? Is our criterion his testimony on waking or

his present behaviour? We say of a dog, when he whines and twitches his feet in sleep, 'He must be having a dream': and here there is no question of what he will tell us when he wakes up. This use of language is not quite serious: one draws no practical consequences from the supposition that a dog is dreaming. But in the case of the young man who says 'Mabel' in his sleep we might draw important conclusions (e.g. that he should be introduced to some other girl). If on waking he does not recall a dream we may say 'You have forgotten it'. But how are we using *this* expression? Does it just mean 'So; you have no dream to tell?', or does it mean 'You had a dream all right but now it has slipped your mind?'

One might suppose that when we say 'He is dreaming', on the basis of his sighs and mutterings in sleep, that either we are using his behaviour as our *criterion* that he is dreaming or else as *evidence* that he will be able to relate a dream, the latter being our criterion. This would be so if our use of language was always clearly one thing or another, always had a definite purpose. I believe that here it is not so. When we say that someone is dreaming on the basis of his behaviour in sleep, our words do not fall definitely into either alternative, and indeed have no clear sense.

The case of nightmares is somewhat different. It is certain that there is a sense of 'nightmare' where the criterion is behaviour. When a man cries out, struggles, appears to be afraid, is difficult to arouse, and continues to exhibit traces of fear as he awakens, we call it a nightmare regardless of whether he can tell a dream. His state was, however, so unlike the paradigms of normal sleep that it is at least problematic

whether it should be said that he was 'asleep' when those struggles were going on.

These odd phenomena and curious uncertainties in our use of language should not obscure the fact that our primary concept of dreaming has for its criterion, not the behaviour of a sleeping person but his subsequent testimony. If someone tells a dream we do not think of doubting its occurrence on the ground that his sleep was thoroughly quiet and relaxed. In this sense of 'dream' a dream has a *content* (a dog's dream has none) which is described when the dream is related. Dreaming in this primary sense is of great interest to people and also poses philosophical problems. Dreaming that has a purely behavioural criterion is of little interest.

Perhaps the greatest cause of perplexity about the telling of a dream as the criterion of the occurrence of a dream is the fact that one cannot apply this criterion to oneself. One does not find out that oneself had a dream by applying that criterion. One uses it only for 'He had a dream, not for 'I had a dream'. This asymmetry may lead one to deny that the third person sentence is governed by this criterion. 'I do not determine that *I* had a dream on the basis of my telling a dream. I use "I had a dream" and "He had a dream" in the *same* sense. Therefore, that another person tells a dream cannot be the thing that determines for me that he had a dream'. The trouble with this fallacious argument lies in the phrase 'the same sense'. One can rightly say that the two sentences are used in the same sense, as contrasted (for example) with the case in which the word 'dream' in one of them meant day-dream. But what is 'the same sense'

here? To use the sentences of this asymmetrical pair in the same sense (in so far as they can be used in the same sense) is to use them in the normal way, where telling a dream serves as a criterion of verification for the one but not the other. To use the sentences 'I weigh 170 pounds' and 'He weighs 170 pounds' in the same sense, in contrast, is to use them in accordance with the same method of verification (same or similar methods of weighing). What it is to use the sentences of a first person third person pair 'in the same sense' depends on what their normal use is. One cannot deduce what their normal use is from the fact that they are used in the same sense.

From the fact that one does not use the above criterion for deciding that one dreamt does it follow that there is not such a thing as *knowing* one dreamt? No. One has grounds sometimes for concluding that one dreamt, and this is knowledge in a proper sense of the word. An example would be to wake up with the impression that one had just painted the bedroom walls blue, and then to note that the walls are still yesterday's yellow: 'So it was a dream'. To find out one dreamt the incident is to find out that the impression one had on waking is false. As one can know one dreamt, so can one be mistaken. You wake up, for example, with the impression that a policeman came into your room during the night; other people in the house *say* this did not occur; you conclude you dreamt it: but the event really happened and the others conspired to deceive you. Suppose you awoke with the impression that you had felt a pain in your leg during the night but you did not know whether this was dream or reality. Would it be impossible for this

question to be settled? No, not impossible. Someone might have heard you cry out and seen you hold your leg at some time in the night. There is a temptation to think that with pain there is no difference between 'real' and 'dreamt'. But there is as much of a distinction here as between having quarrelled with someone and having dreamt that one quarrelled.

I am inclined to believe that statements of the form 'I dreamt so and so' are always inferential in nature. I do not mean that one always arrives at them by explicit processes of inference but rather that one might always defend them as conclusions from certain facts or supposed facts. If someone were to ask you how you knew that you dreamt so and so, you could always mention something that you supposed proved or made probable that the thing in question did not occur and that therefore you dreamt it.

What can have no justification and requires none is your statement that you have the *impression* that so and so occurred. (You may or may not believe that it did occur.) In this sense you cannot find out that you dreamt, although you can find out that someone else dreamt. What it does make sense to find out is whether your impression corresponds with reality, and to discover that it does not is to discover that you had a dream.

I said previously that in a dream anything is possible. We can see why this is so. If we know that it is impossible for a certain thing to have occurred then the waking impression that it occurred is false, and we know therefore that one dreamt the impossible thing. Where the choice is between dream and reality the impossibility, in any sense, of a thing places it in a dream.

My assertion that the question 'How do you know you dreamt so and so?' can have the sense just described may appear to conflict with the claim at the beginning of this chapter that it is part of our concept of dreaming that we do not question whether someone had a dream or whether it merely seems to him that he did. But there is no conflict. What was meant there was that when someone on awaking 'remembers' certain incidents, and we know they did not occur, then we say he *dreamt* them, i.e. they 'occurred in a dream'. There is not a *further* question of whether a dream or the events of a dream really took place during sleep. If a man wakes up with the impression of having seen and done various things, and if it is known that he did not see and do those things, then it is known that he dreamt them. No problem remains of whether a dream really existed during his sleep, of whether anything *corresponds* to his memory of a dream.

It is to be noted that when someone says he dreamt so and so, he does not imply that while he was sleeping he was aware of being asleep or was aware of dreaming. When he says 'I dreamt so and so' he implies, first, that it seemed to him on waking up as if the so and so had occurred and, second, that the so and so did not occur. There is simply no place here for an implication or assumption that he was aware of anything at all while asleep. His testimony that he had a dream does not involve that nonsensical consequence.

I have said that the statement 'I dreamt such and such' implies that the such and such did not occur. Let us consider Pharaoh's dream, recorded in *Genesis* XLI, 17-24: (Revised Standard Version).

Behold, in my dream I was standing on the banks of the Nile; and seven cows, fat and sleek, came up out of the Nile and fed in the reed grass; and seven other cows came up after them, poor and very gaunt and thin, such as I had never seen in all the land of Egypt. And the thin and gaunt cows ate up the first seven fat cows, but when they had eaten them no one would have known that they had eaten them, for they were still as gaunt as at the beginning. Then I awoke. I also saw in my dream seven ears growing on one stalk, full and good; and seven ears, withered, thin, and blighted by the east wind, sprouted after them, and the thin ears swallowed up the seven good ears.

It is plain enough that if Pharaoh had believed that during the night he had actually gone out and stood on the banks of the Nile and seen seven thin cows eat up seven fat ones, he would not have put into his narrative the phrase 'in my dream'. But suppose Pharaoh's tale had gone like this: 'Behold, in the night it seemed to me that I was standing on the banks of the Nile; and it seemed to me that seven cows, fat and sleek, came up out of the Nile and fed in the reed grass; . . . etc.'. Would his declaration that this was a dream have the force of implying that it did not *seem* to him that he stood on the banks of the Nile, and all the rest?¹ Yes. For suppose it was independently known that it had seemed to him, at some time during the night, that those things were occurring. Suppose that someone had observed him to sit up in bed and exclaim 'Behold, there is the Nile

¹ Note Descartes' remark: '... in sleep we continually seem to feel or imagine innumerable things which have no existence' (Descartes (2), I, p. 220).

before me and, lo, here are seven cows, fat and sleek . . .' Let us suppose that he stared, gestured and pointed as a man might who was hallucinated. Then we should have corrected his morning's narrative, saying 'No, it was not a dream. You had an hallucination at about midnight last night, in which those things appeared to you'.¹

There is a restriction that needs to be put on the principle that 'I dreamt that *p*' implies 'not-*p*'. Someone in California might dream one night that Westminster Abbey was destroyed by fire and discover the next day that this had really happened. In this sense a dream could be 'veridical'. But if his dream narrative contained statements like 'I *saw* it burning', 'I *heard* the walls crashing'; or 'It *seemed to me* that I could see it burning and hear the walls crashing'—those statements, which ostensibly report experiences he had while asleep, would all be false. If we try to consider the statements composing the description of a dream in the normal use that they have outside of dream-telling discourse, then those among them that ostensibly report experiences of the speaker, are *necessarily* false—for if they were not false they could not properly be said to belong to the description of a *dream*. (Thus the claim is mistaken that it is merely a *contingent* matter that the visual, auditory and tactual contents of dreams are 'non-veridical'. See page 8.) There is however another way in which all the statements in a dream report, both

¹ I am denying that a dream *qua* dream is a seeming, appearance or 'semblance of reality'. In telling a dream, however, one can say 'It *seemed* . . .', when this means that there was a vagueness or uncertainty in the dream. Otherwise it would be wrong to use this locution.

those ostensibly reporting experiences and those ostensibly reporting physical events, may be taken, and when taken in this way 'I dreamt that *p*' entails '*p*'. This will be explained in Chapter 15.

TEMPORAL LOCATION AND DURATION OF DREAMS

SINCE the notion of a dream as an occurrence that is logically independent of the sleeper's waking impression has no clear sense, it follows that the notions of the location and duration of a dream in physical time also have no clear sense. I mean that this is so if one keeps to the primary concept, where the sole criterion of the occurrence of a dream is the waking report. One may be easily tempted however to *give* a sense to these notions, as the following will illustrate.

A considerable amount of scientific work has had the aim of trying to establish correlations between dreaming and various physiological phenomena such as brain potentials, action currents, galvanic skin responses, and blood pressure. I will refer to one very recent study. The authors begin by saying:

The study of dream activity and its relation to physiological variables during sleep necessitates a reliable method of determining with precision when dreaming occurs. This knowledge, in the final analysis, always depends upon the subjective report of the dreamer, but becomes relatively objective if such reports can be significantly related to some physiological phenomena which in turn can be measured by physical techniques (Dement & Kleitman, p. 339).

The physiological phenomenon studied in their experiments was rapid eye movements, recorded by sensitive instruments. The procedure was to waken the subjects from sleep during periods of rapid eye movements (abbreviated 'REM') and also during periods when there were no rapid eye movements (abbreviated 'NREM'), in order to find out whether they could recall dreams. With 9 subjects there were 191 awakenings during REM periods and 160 awakenings during NREM periods. The incidence of dream recall was high after the REM awakenings (152 out of 191) and low after the NREM awakenings (11 out of 160). It was observed that the duration of REM periods that were not terminated artificially by an awakening varied from 3 to 50 minutes with a mean of about 20 minutes. This was thought to suggest a measure of the duration of dreams. To test this the following experiment was performed: Subjects were awakened either 5 or 15 minutes after the beginning of REM's and 'were required on the basis of their recall of the dream to decide which was the correct duration' of the dream. In 51 of the 5 minute awakenings the subjects decided in favour of 5 minutes a total of 45 times; in 60 of the 15 minute awakenings they decided in favour of 15 minutes a total of 47 times. The authors' conclusion is that all subjects, with one exception, 'were able to choose the correct dream duration with high accuracy'. They say of the one exceptional 'inaccurate' subject that he 'made most of his incorrect choices by estimating 15 minutes to be 5 minutes'. They add:

This is consistent with the interpretation that the dream was longer, but he was only able to recall the latter

fraction and thus thought it was shorter than it actually was (p. 343).

They also say:

In addition to depending on the amount of actual dreaming, the lengths of the dream narratives were undoubtedly influenced by many other factors as, for example, the loquacity or taciturnity of S [the subject] (*Ibid.*).

An ingenious attempt was made to correlate the REM's with dream content. Sometimes the REM's were mainly vertical, sometimes mainly horizontal, sometimes a mixture of both. 'It was hypothesized that the movements represented the visual imagery of the dream, that is, that they corresponded to where and at what the dreamer was looking'. Only three cases of purely vertical movements were observed.

After each of these the dream content involved a predominance of action in the vertical plane. One S dreamed of standing at the bottom of a tall cliff operating some sort of hoist and looking up at climbers at various levels and down at the hoist machinery. Another S dreamed of climbing up a series of ladders looking up and down as he climbed. In the third instance the dreamer was throwing basketballs at a net, first shooting and looking up at the net, and then looking down to pick another ball off the floor. Only one instance of pure horizontal movement was seen. In the associated dream S was watching two people throwing tomatoes at each other (p. 344).

Twenty-one awakenings occurred after a mixture of movements and always the subjects reported that in their dreams they were looking at things close to them.

Finally, the eye movements of subjects who were awake and were observing either distant or nearby occurrences, were recorded by the same apparatus. 'The eye-movement potentials in all cases were comparable in both amplitude and pattern to those occurring during dreaming'.

The following are among the conclusions drawn by the authors: The experiments indicate that dreaming 'occurred periodically in discreet episodes during the course of a night's sleep', that is to say, in periods of rapid eye movements. The few examples of dream recall when there were no eye movements 'are best accounted for by assuming that the memory of the preceding dream persisted for an unusually long time. This is borne out by the fact that most of these instances occurred very close, within 8 minutes, after the end of REM periods' (p. 345). Some previous views about the duration and 'progress' of dreams appear to have evidence against them:

There was nothing in the experiments reported in this paper to indicate that the dreams occurred instantaneously, or with great rapidity, as some have supposed. Rather, they seemed to progress at a rate comparable to a real experience of the same sort. An increment in the length of REM periods was almost invariably associated with a proportional increase in the length of the dream (p. 346).

Finally:

It seems reasonable to conclude that an objective measurement of dreaming may be accomplished by recording REM's during sleep. This stands in marked

contrast to the forgetting, distortion, and other factors that are involved in the reliance on the subjective recall of dreams. It thus becomes possible to objectively study the effect on dreaming of environmental changes, psychological stress, drug administration, and a variety of other factors and influences (*Ibid.*).

These experimental findings would incline many people to want to employ the phenomenon of rapid eye movements as the *criterion* of the occurrence, temporal location and duration of dreams. If one consciously decided to do this one would then say of a person awakened during a period of these movements, who could recall no dream, that he had *forgotten* the dream (which undoubtedly occurred). One could say even that he had not been *aware* of the dream (just as it is often said that people are not always aware of their sensations); for what would be the difference here between saying that he had been aware of the dream but forgot it, and saying that he had not been aware of it when it occurred? The temptation to take the latter step would be nearly irresistible if a person who was awakened during an REM period insisted that he had *not* been dreaming. If someone had a 'long' dream (as measured by the duration of the REM period) but could recall only a 'short' dream (as measured by the number of words in his dream narrative and also by his impression that it was a 'short' dream) then one would say that he remembered only a 'fraction' of the dream, as Dement and Kleitman actually suggest. If a person who was awakened during a period of no eye movements related a dream, one would say (as Dement and

Kleitman 'assume') that his memory of the *preceding* dream had persisted.

I do not claim that Dement and Kleitman actually made the decision to use eye movements as their criterion of dreaming. If they had done so, deliberately and consciously, their conclusions would not be as tentative as they are. At the same time they are strongly drawn toward that decision, and this is understandable. They want to do *scientific* work on dreams and therefore they need 'a reliable method of determining with precision when dreaming occurs' and exactly how long it lasts. This need is not filled by the criterion of 'subjective reports' of dreams.

The interest in a physiological criterion of dreaming is due, I believe, to an error that philosophers, psychologists, physiologists and everyone who reflects on the nature of dreaming tends to commit, namely, of supposing that a dream *must* have a definite location and duration in physical time. (This is an excellent example of what Wittgenstein calls a 'prejudice' produced by 'grammatical illusions'). It might be replied that a dream is surely an *event* and that an event must have a definite date and duration in physical time. But this gets one nowhere, for what justifies the claim that a dream is an event in *that* sense? There can be only as much precision in the common concept of dreaming as is provided by the common criterion of dreaming. The testimony of the sleeper does sometimes determine *when* a dream occurred. A man may say that he was dreaming 'just before' he awakened, or that he woke up 'in the middle' of a dream, or that in his dream he jumped from a cliff 'and then awoke'. This testimony does not

provide however a determination that would be satisfactory to physical science. One has no idea what 'just before' the sleeper awakened would amount to on the clock: it is not *that* sort of determination. It is something he is *inclined to say* on waking up. It is no part of the concept of dreams to provide a translation of this impression into physical time.

There is however a feature of dream-telling that does appear to yield a determination in physical time. People often make connections between their dreams and physical events: e.g. 'I dreamt it was thundering; the thunder grew louder and louder; finally I awoke and realized that it was the hammering of the radiator'. It would seem that the dream is simultaneous with the physical event and therefore an exact time of occurrence by the clock can be fixed for both. Here the connection with a physical event was made directly by the testimony of the awakened person. But it might be established in a different way. It might be proved (and indeed there is considerable evidence for it—e.g. Ramsey, pp. 441-442) that the contents of dreams can be causally influenced by external stimulation of the sleeper (e.g. if his blankets were removed he would dream of snow, icebergs, and freezing cold). Then would it not be certain that the dream occurred at the same time as (or after) the physical event that causally influenced the content of the dream?

It would certainly be overwhelmingly natural for us to adopt this *convention*—for that is what it would be. No one would have directly observed any causal or temporal relation between dreams and physical occurrences (nor would it make sense to do so), but

only between *reports* of dreams and physical occurrences. Since our usual criterion of the occurrence of a dream is the report, the natural step to take in assigning a location in physical time to a dream would be to say that the dream was simultaneous with the physical occurrence during sleep, if there was one, that influenced the waking account of the dream. This would be a definition and not a discovery. One is not *required* to give any sense to the location of dreams in physical time.

It might be said that since dreams occur *in* or *during* sleep, and since sleep is a phenomenon in physical time, therefore dreams must occur in physical time. But here one is being carried away by spatial imagery. The locution that dreams occur 'in' sleep is used in this way: people declare on awaking that various incidents *took* place (past tense) which did not take place. We then say that these incidents were *dreamt* (past tense). This is merely how we label the above facts, which imply nothing about the occurrence of dreams in physical time.

The natural convention mentioned above would still have unsatisfactory features from the standpoint of physical science. It would still rely on the awakened person's report; it would provide no criterion for the temporal location of dreams whose content could not be connected with external stimulation during sleep; and it would provide no criterion of *duration*. Consider this last point. There is of course a familiar notion of the duration of dreams. In telling a dream one sometimes says it was a 'short' or a 'long' dream. This is one's waking impression. But this is not duration in physical time. Dream-telling cannot yield *that* concept.

Here it becomes obvious how new convention—stipulation—must enter the scene if that concept is to be provided.

Dement and Kleitman speak of the 'length' of a dream without realizing, apparently, that it has no clear sense and must be given one. They say that an increase in the length of the period of rapid eye movements was 'almost invariably associated with a proportional increase in the length of the dream' (p. 346). But what is their criterion of the *length* of a dream? It should not be the duration of the associated REM period, for that would make nonsense of their assertion of a *proportional relation* between the two. Yet their article contains an indication that this is their criterion. In giving an account of their experiment with the 'dream-duration estimates' of their subjects (where the latter were awakened after either 5 or 15 minutes of rapid eye movements and 'required on the basis of their recall of the dream to decide which was the correct duration') they report that all subjects save one 'were able to choose the correct dream duration with high accuracy' (p. 343). How is it decided what the correct dream duration was? Nothing explicit is said on this point in the article. The most plausible conjecture is that their criterion of the duration of a dream is the duration of the associated REM period. But if the duration of the two is identical then it is truly nonsense to say that an increase in the duration of the REM periods was 'almost invariably associated with a proportional increase in the length of the dream' (p. 346).

These physiologists are in a muddle about the duration of dreams because, I think, they do not

realize that in the familiar concept of dreaming there is no provision for the duration of dreams in physical time.¹ They assume that this provision is already *there*, only somewhat obscured and in need of being made more precise. The truth is that this notion does not belong to the common concept of dreaming at all. To see this is to realize that to bring it in is to create a new concept under an old label.

That Dement and Kleitman have an erroneous picture of the concept of dreaming comes out, I believe, in their choice of the phrase 'the subjective report of the dreamer' (p. 839), and in their concluding remark that rapid eye movements would seem to provide 'an objective measurement of dreaming' in contrast to the ordinary reliance on the 'subjective recall' of dreams (p. 346). They take for granted that the distinction 'subjective-objective' applies to dreams. This distinction is identical with the distinction of 'appearance and reality'. But if someone tells a dream or says he had one he is not making a 'subjective' report which may or may not agree with 'objective' fact. His waking impression is what establishes that he had a dream, and his account of his dream establishes what the content of his dream was. If he has a vague impression of his dream then it was a vague dream. If he is not certain whether he

¹ Empirical studies of dreaming have produced the most divergent estimates of the duration of dreams, some investigators holding that dreams rarely last more than 1 or 2 seconds: others believe that it is 1 to 10 minutes. Dement and Kleitman, as reported above, think that dreams last as long as 50 minutes and that the average length is 20 minutes. These different estimates arise solely from the employment of different criteria of measurement. For an interesting survey of experimental work on dreams see Ramsey.

dreamt then there is an uncertainty in reality. His impression is the criterion of reality and therefore it cannot be characterized as 'subjective'. 'Subjective' and 'objective' are *one* in the case of dreams—which is to say that this distinction does not apply.

Without an adequate realization of what they are doing, Dement and Kleitman are proposing a new concept in which the notions of location and duration in physical time and the subjective-objective distinction will all have a place. We ought to consider the consequences of these stipulations and ask ourselves whether it is appropriate to call this creation a concept of *dreaming*. If rapid eye movements during sleep became the criterion of dreaming one consequence is that if someone were to tell a dream it could turn out that his impression that he dreamt was *mistaken*—and not in the sense that the incidents he related had really occurred and so his impression was not of a dream but of reality. The new concept would allow him to be mistaken in saying he had a dream even if his impression that he had seen and done various things was false. Another consequence is that it would be possible to discover that a man's assertion that he had slept a dreamless sleep was in error: and here one would have to choose between saying either that he forgot his dreams or that he had not been aware of them when he dreamt them. People would have to be *informed* on waking up that they had dreamt or not—instead of their informing us, as it now is. It could turn out that there was a tribe of people among whom the phenomenon of telling a dream was quite unknown—and yet physiological experiments proved that all of them dreamt every night.

Consider how differently the new concept would be *taught*. As things are, a certain kind of narrative produced in certain circumstances is what we call 'telling a dream', and we teach a child to preface such narratives with the word 'I dreamt'. If the physiological criterion were adopted, telling a dream would be only a more or less reliable indication of dreaming. It would not be, as now, a matter of definition that someone who told a dream had dreamt. We should not be justified in teaching him to begin those narratives with 'I dreamt'. To teach him the new concept of dreaming we should have to explain the physiological experiment that provides the new criterion. If mankind should cease to tell dreams the physiological criterion of dreaming could still be employed with possible affirmative results. Much information about the 'dreaming habits' of people might continue to be collected. But what were then called 'dreams' would no longer be of interest to poets, psychoanalysts, philosophers, and to all of us, children and adults, who like a strange tale.

Considering the radical conceptual changes that the adoption of a physiological criterion would entail, it is evident that a new concept would have been created that only remotely resembled the old one. To use the name 'dreaming' for the new concept would spring from confusion and result in confusion. All of this can be avoided by holding firmly to waking testimony as the sole criterion of dreaming. Physiological phenomena, such as rapid eye movements or muscular action currents, may be found to stand in interesting empirical correlations with dreaming, but the possibility of these discoveries presupposes that these

phenomena are *not* used as the criterion of dreaming. The desire to know more about dreaming should not lead scientists into transforming the concept in such a way that their subsequent discoveries do not pertain to *dreaming*.

A QUEER PHENOMENON

I HAVE stressed the senselessness, in the sense of impossibility of verification, of the notion of a dream as an occurrence 'in its own right', logically independent of the waking impression, and to which the latter may or may not 'correspond'. Prior to that I argued that dreams cannot contain, or be identical with, judging, reasoning, feeling, imagery, and so on, for the reason that with respect to any of these things the question, 'How can it be *known* that this took place while he was *asleep*?', cannot be successfully answered—whereas the question, 'How can it be known that his *dream* occurred while he was *asleep*?', cannot be sensibly asked because of the entailment between dreaming and sleep. It may appear that these points are in conflict. On the one hand I say that the occurrence of a dream during sleep is impossible of verification, *if* one tries to conceive of dreaming as logically independent of the waking impression. On the other hand I say that the occurrence of reasoning, feeling, imagery, etc., during sleep is impossible of verification. Therefore the mark of distinction, which I laboured to make out, between dreams and these other things, seems to have vanished.

This is the appearance, but nevertheless the

distinction is preserved, as I will try to explain. The question about the 'real existence' of dreams, i.e. whether dreams take place in logical independence of waking impressions, and whether the latter correspond or not to the dreams, is a purely metaphysical question that does not arise in the ordinary commerce of life and language. If one knew that someone was telling a dream in all naturalness and sincerity, one would have to be in a philosophical humour to propound a doubt as to whether a dream had really occurred during his sleep or whether he was mistaken in thinking so. One cannot have this doubt without violating in one's thinking the common use of language. This is not at all the case with respect to someone's imagined claim that he reasoned, made a decision, remembered something, felt a sensation, etc., while he slept. 'How do you know this occurred while you *slept*?' would be a natural and legitimate question, with nothing metaphysical about it. It would betray no confusion about the common concepts of dreaming and sleep. Quite the contrary. This proper question would cry to be asked: but no respectable answer could be made out—which would show that something was wrong with the claim that gave rise to the question.

Suppose however that no one did ask this question, not because of neglect or dull-wittedness, but because the question was considered to be inappropriate. What I am supposing is that we might take someone's assertion that he reasoned or made a decision or had some experience, *while he slept*, in such a sense that the request for proof or grounds ('How do you know this happened while you slept?'), was irrelevant—not a part of 'the language-game'. If we did this we

should be taking the assertion in the same sense as the report of a dream!

To be sure, if his whole statement was merely, say, that he had made such and such a decision while asleep, we should not call this a report of a dream, because a *dream* is supposed to involve a number of incidents connected in some fashion. Telling a dream is telling a kind of *story*. In the story there can occur several incidents like deciding to quit one's job or feeling angry. To relate merely a single thing of this sort is not to tell a dream. But this is not an important point here. What is important is that the relation of some single happening or act (feeling angry or solving a problem) as having occurred during sleep, would have the same conceptual status as the report of a dream, *if* a request for grounds was inappropriate.

We can imagine a tribe of people who do not have any locution equivalent to 'I dreamt'. Sometimes they wake up with the impression of having thought, done, decided and felt various things while asleep. Their reports of these occurrences are taken in the way just supposed, the question of verification not being for them a relevant question. It would be right for the anthropologists who observed them to say that their reports are reports of *dreams*, even though these people have no words equivalent to 'dream' or 'dreamt'.

In general the expression 'I dreamt', as we use it, serves as a sign that the ensuing narrative of incidents in sleep is to be taken in this special sense, namely, that it will be inappropriate to request grounds for the statements that compose it. One could say: we accept the narrative without proof, not because we *assume* it

will be true, but because the concept of truth that applies here has nothing to do with proof. In this respect telling a dream is like imagining something ('You are the mama tiger and I am the baby tiger'). It is unlike in the important respect that in it there is no place for inventiveness, for changing one's mind, for having things as one will. One tells a dream under the influence of an impression—as if one was faithfully recalling events that one witnessed. Telling a dream is undoubtedly a queer phenomenon.

'This "queer phenomenon" requires an *explanation*', we are inclined to protest: 'The most likely explanation of our seeming to recall certain experiences from sleep is that we did *have* those experiences while we slept'. But an 'explanation' explains nothing if it involves an unintelligible hypothesis. Nothing can count for or against the truth of this hypothesis. We can say either that there were experiences during sleep or that there were not, as we like. Whichever assertion we care to make, it can play no part in our daily employment of the concept of dreaming. 'A wheel that can be turned though nothing else moves with it, is not part of the mechanism' (Wittgenstein, § 271).

The above protest may take different forms. One can be puzzled as to why dreams are related in the *past tense*, if we did not actually think and experience various things in our past sleep. Or one can be struck by the fact that in relating dreams we use the *same language* that we employ in describing our normal perceptions. 'The cloak you wore in my dream was this identical red' (pointing at a piece of cloth). 'How can we make such a comparison as this', one wonders,

'unless we were aware in our sleep of something, possibly an image, of that exact colour? Surely we employ the same words *because* we experience in sleep things that are qualitatively similar to the things we experience when awake' (see Yost & Kalish, p. 119).

Such 'inferences' get us nowhere: they turn a wheel that moves nothing. 'Our mistake is to look for an explanation where we ought to look at what happens as a "proto-phenomenon". That is, where we ought to have said: *this language-game is played*' (Wittgenstein, § 654). In a lecture Wittgenstein once said that it is an important thing in philosophy to know when to *stop*. If we cease to ask *why* it is that sometimes when people wake up they relate stories in the past tense under the influence of an impression, then we will see dream-telling as it is—a remarkable human phenomenon, a part of the natural history of man, something *given*, the foundation for the concept of dreaming.

It may be thought wrong to call dream-telling a 'language-game'. Wittgenstein introduces this phrase in connection with such examples as giving orders, teaching names, and counting objects, where there are various related actions of fetching things, repeating words, pointing, etc. He says he will 'call the whole, consisting of language and the actions into which it is woven, the "language-game"' (*Ibid.*, § 7). But with dream-telling there are no actions but only language! For another thing, a 'language-game' is supposed to be something that is *learned*, and does one *learn* to tell dreams? We do have to learn the language we employ in telling dreams but the teaching occurs elsewhere

and not in a language-game of dream-telling. To be sure we are taught to use the noun and verb 'dream'. But this is not essential: dreams could be told without this locution.

What we must learn is to *take* an after-sleep narration in a certain way: trying to ascertain if it is an invention or if it proceeds from a genuine impression; distinguishing this impression from a true or false recollection of events that occurred before the person slept, or while he (ostensibly) slept; not questioning the accuracy of the impression but accepting the narrative on the speaker's say-so. Learning to take an awakened person's past tense narrative in this way is learning the concept of dreaming. The speaker too cannot be said to have the concept unless he knows that his narrative is to be taken like that. To the extent he was unclear about this, it would be doubtful whether he was telling a dream, or relating events he believed himself to have participated in the day before, or making up a story, or a number of other things.

I heard of a small boy who, on waking up one morning, excitedly told a story about being chased by a wolf. He had tried to run into the house and struggled frantically with the kitchen door as the beast rushed toward him. Finally he got the door open and escaped. His mother said, 'It was a dream'. The boy exclaimed angrily, 'Well the next time I have a dream you leave the kitchen door open!' His mother knew the boy was telling a dream but the boy did not. We see here an ambiguity in 'He told a dream'. In a sense the boy did not tell a dream—he did not intend that his sentences should be given that special sense described

above. But his mother gave them that sense when she said, 'It was a dream'.

There is a particular mode of employing and taking sentences that must be mastered for it to be true that one is telling a dream or understanding someone else to be telling a dream. This is the 'game' one learns. What is it then that is *not* learned? It is the initial inclination to *say* things like 'I was in a strange house; I saw the walls begin to sway; I became frightened and then I woke up'. This is the 'raw material' of the concept. The corresponding raw material in the language-game of 'slab and beam' (Wittgenstein, § 2) is, I suppose, the pupil's tendency to *respond* to the instructor's commands and gestures, e.g. to *look* where the latter points.

This comparison may, however, make the difference appear too slight. One reason for reluctance to speak of a 'language-game' of dream-telling is that the idea of a teacher-pupil relationship seems unsuitable there. No words need be taught at all. 'You dreamt it' could be taught but does not have to be. A peculiar mode of employing indicative sentences must be 'picked up'. There is rarely, if ever, explicit teaching. But this seems to be only a matter of degree: for when people learn games (in the normal sense of 'game') they commonly pick up more than they are explicitly taught.

I have no particular interest in defending the application of the phrase 'language-game' to dream-telling. A 'language-game' is 'a game with language'. In dream-telling sentences are used and taken in a special way. Those *same* sentences are also used in quite other ways. Here the analogy with games is

natural and striking. It is as if one made moves in chess with chess pieces, but sometimes used those *same* pieces to make moves in checkers, a very different game! There is some analogical appropriateness in saying that in dream-telling we are employing language in a game that differs sharply from the game we play with those same pieces of language when we describe a recent adventure or make up a story. On the other hand, dream-telling is a long way from 'slab-beam'. There is no 'whole, consisting of language and the actions into which it is woven'; no new words need be introduced; no explicit teaching need occur. Furthermore, dream-telling presupposes a previous mastery of uses of language that are very different from its use in dream-telling. 'Slab-beam' does not presuppose any previous understanding of language: it could be 'a complete primitive language' (*Ibid.*). Dream-telling could not. Considering these differences, if you regard 'slab-beam' as a *paradigm* of 'language-games' (which is a mistake, for it is intended to be an illustration of only *one* use of language) you will think it wrong to call dream-telling a language-game. But nothing of importance turns on accepting or rejecting this term of art.

CONTINUITY BETWEEN DREAMS
AND WAKING LIFE

THE main thesis of this monograph would appear to be refuted by the fact that very often there is continuity between the contents of one's dreams and one's emotions and sensations after awaking. A psychological study of childrens' dreams found that one-half of the children in the study 'were so disturbed by unpleasant dreams that they expressed a wish that they would never dream again'. Another investigation discovered that two-thirds of the subjects 'had day-time worries about unpleasant night dreams' (Ramsey, pp. 443-444). The difficulty for my thesis is the following: Suppose someone relates a dream in which, say, he was very frightened of horses. He shows a persisting fear of horses throughout the day and says it is the *same* feeling he had in his dream. Should we not take this testimony as establishing that he had a certain feeling when asleep in the *same* sense that he now has it when awake? If so, sleep can have a genuine 'content of experience'.¹ Or consider this example:

¹ For an argument of this sort see Brown p.48. This discussion is a criticism of my paper 'Dreaming and Skepticism', *Philosophical Review*, January, 1956. I reply to Brown in 'Dreaming and Skepticism: A Rejoinder', *Australian Journal of Philosophy*, December, 1957.

Asthma sufferers often dream that they are suffocating, and upon awaking discover that they are suffocating. Their dreams of suffocating are very vivid and fantastic; they are unquestionably dreams. Yet the feeling of suffocation that they have in a dream seems most powerfully to continue one and the same after they wake up. And most of them would say that however fantastic and non-veridical the visual part of the dream was, the feeling of suffocation was veridical and in no way different from the veridical feeling of suffocation they have upon awakening (Yost & Kalish, p. 120).

A little reflection will reveal that it is no accident that there is continuity between dream contents and waking experiences. How could someone show us that a dream of his was unpleasant other than by his having an *unpleasant impression* of it on awaking? Or that he dreamt of something horrible unless he had an impression of horror when relating the dream? The fact that the criterion of the contents of a dream lies in the telling of the dream requires that the narrating of dreams with strong emotional content should be affected with the emotion attributed to the dreams. If he said 'It was horrible' but showed no genuine impression of horror, we should think the dream was not so bad.

Beyond the fact that the concept of an unpleasant dream necessarily requires emotional continuity between dreaming and waking, the general concept of dreaming requires that there be continuity between dreams and sensation and perception. When we tell dreams we must use language we have mastered and we must use words in their familiar senses. When I describe the figures, movements and actions of dream

scenes I use ordinary vocabulary with ordinary meanings. If I say that the man who talked to me in my dream wore a hat, I should be presumed to be using the word 'hat' in its ordinary sense, and it would not be surprising if I pointed to a hat and said, 'It was just like this one'. If I related that his posture was odd I might be able to *illustrate* it. I may say he flapped his arms like *this*. I may say it all happened on the top of a hill that looked like *that* one over there, or even *was* that one. The man may have been my brother, the one who is a surgeon in California. And I may have felt a vibration as he talked, the same sensation that one has when a large truck shakes the ground as it goes by.

There is not and could not be a special vocabulary for telling dreams. We employ familiar words in the normal senses they have in daily discourse. Often we give *examples* of the perceptions and sensations of our dreams. Often the objects and persons that we encounter in dreams are the same objects and persons we deal with in daily life. Those philosophers who think that dreams are shadow-shows of imagery should be brought up short by the consideration that one's *brother* may appear in a dream. *Not* an image or vision of him (this too is a possible dream, but a different one) but one's actual brother—'the one who does surgery out in Long Beach, California'. The brother in one's dream may be 'in no way different' from one's brother, just as the feeling of suffocation in one's dream may be 'in no way different' from the feeling of suffocation that a victim of asthma sometimes experiences. There is *identity* in the one case as much as in the other. The only question is: what is

this concept of identity? How is identity established here? Well, the person who tells the dream does not establish identity at all. He just *says* that it was his brother who was in his dream: that is his impression: and the rest of us rely on his impression as *establishing* identity. (We do not think of trying to confirm the point by telephone calls or fingerprints.)

The concept of dreaming requires that some of the *same* objects, people, thoughts, perceptions, emotions, that are encountered and experienced in normal waking life should be present in dreams: some identity and continuity is necessary. This identity consists in the dream-teller's employment of the *same* language that he was taught and learned to employ to describe the scenes and experiences of life. As I said in the last chapter, it is fruitless to argue that this identity of language is due to an identity of experience that lies behind it: the identity of language is the *criterion* of the identity of dream objects and dream experience. The latter does not explain the former. The language is the same and the senses of individual words are the same: but the mode of employment of each sentence and the whole narration is different and special.

To be sure there is continuity between dreams and waking life. But if you were angry at your brother in your dream last night it no more follows that you were angry last night than that you were with your brother last night. Or we could say instead that *both* things follow tautologically. Let me explain. A possible way of telling a dream is to omit the preface 'I dreamt' and to relate such a story as this: 'Last night my brother and I were standing at the top of a hill. He was talking to me and flapping both arms as he spoke. I was very

angry with him and told him to stop moving his arms. That is all I remember'. If this is related and taken in such a way that it would be irrelevant to point out that there are no hills hereabout, or that the speaker's brother is three thousand miles away and has only one arm, or that the speaker was sound asleep in his bed all night long; if this story is accepted on the speaker's mere say-so, because here the special criterion of truth is truthfulness—why then the speaker was angry last night in exactly the same sense as the sense in which he was with his brother last night. If the narrative is prefaced with 'I dreamt', but still related and taken in the same way, nothing is changed. The preface merely names the mode of narrating and taking. 'I dreamt that *p*' will, therefore, entail '*p*'. when '*p*', is taken in the special dream-telling sense, but *not* in any other sense. Philosophers see that this is so when there is substituted for '*p*' a past tense sentence that ostensibly reports a *physical* incident, e.g. 'We were standing at the top of a hill'. But when the sentence substituted for '*p*' ostensibly reports a *mental* incident, e.g. 'I was angry at my brother', there is a temptation to think that 'I dreamt that '*p*' entails '*p*', where '*p*' is not to be taken merely in a dream-telling sense, but in its normal sense of reporting a real incident of life.

This confusing of two different modes of discourse may come, in part at least, from an overtly simple conception of the normal use of first person psychological sentences referring to the immediate past. I will call this their 'historical' use and I wish to compare it with their 'dream-telling' use. With respect to many occasions of use of a sentence like 'Yes, I was frightened

when we crossed that bridge just now', in its historical sense, it has no meaning to suppose that the speaker is *mistaken* as to what his feeling was. In this respect the historical use of first person psychological sentences is no different from their dream-telling use. If this exhausted the comparison there would not be any difference at all in the use of those sentences as they occur inside and outside of dream reports. But there are points of dissimilarity. For one thing, if a man declares that at some recent time he was angry (or frightened or in pain) you may challenge his statement on the ground that it does not square with how he looked and acted at the time. 'You say you were angry at him? You certainly did not look or act angry. You spoke quite pleasantly to him'. He may be able to give some sort of explanation of the discrepant appearance. 'Since I was his host I was determined to commit no rudeness'. Or he may not: in which case we might not *believe* his story about being angry, preferring to think that he has not described his feeling accurately, or is exaggerating or fibbing. *Prima facie* a discrepant appearance stands in need of an explanation. But when we come to a man's dream report, there is no presumption that it should square in this way with his past looks and actions. If he says, 'Last night I felt very angry with my brother', it would show that you did *not* understand him to be using his sentence in the dream-telling way if you said, 'But you seemed to be sound asleep; you showed no sign of anger at all'. Indeed the relation of reports, in their dream-telling sense, to the speaker's appearance is the *reverse* of what it is in their historical sense. If his looks and actions last night were angry, this

would fit in with his historical report of being angry and not with his dream report. One could say that when his sentence is taken in its dream-telling sense it is *required* that the appearances be discrepant.

A second way in which the historical and dream-telling senses of psychological statements differ is in respect to *consequences*. Suppose a man says, 'Last night I had a toothache'. If this is a historical report it would be in order to send him to a dentist, but not if he is telling a dream. If he says, 'I was angry at my brother because he flapped his arms', you might wish to rebuke him for being so easily provoked, or urge him to ask his brother's forgiveness for that ill feeling: but those reactions to his statement would be appropriate only if you understood him to be speaking in the historical sense. We might go on through a list of various psychological sentences, mentioning how it is appropriate to draw this or that consequence (both in words and actions) when they have the historical and not the dream-telling use.

A third point of difference in the two uses of psychological sentences concerns their implication with respect to the relation of the reported events to physical time. If a man says that he felt outraged (or embarrassed or dizzy) last night, and is speaking in the historical mode, you could ask him to supply a context of physical events. Did this occur when he was talking to Smith in the dining room, or while he was playing the piano? He might not remember. But it would make *sense* for you to request and for him to provide information of this sort that would give an exact temporal determination for those psychological events. This would not be so if his statement belonged

to the report of a dream. He can say, 'It happened while I was asleep', but this is redundant. The only context he can supply is that of events in his *dream*; but this yields no determination in physical time.

First person past tense psychological sentences have sharply different 'grammars' in these two modes of discourse. I have mentioned different relations to the speaker's circumstances and behaviour, to consequences, and to temporal determinations. There are no entailments between the statements in these two uses. Russell fails to see the differences between the historical and dream-telling uses of psychological sentences in holding that when we see, hear and remember in dreams we do 'really' see, hear and remember (see page 8). 'Then I remembered . . .' in its dream-telling sense does not entail the statement that would be made by using this sentence in its historical sense. And 'In my dream I remembered . . .' entails 'I remembered . . .', only if the latter is understood in its dream-telling sense—in which case the entailment is trivial and not worth remarking. The same failure appears to be responsible for the view of Yost & Kalish that visual, auditory and tactual contents of dreams are only *contingently* 'non-verdical' (see page 8). Anything in the behaviour of a person that confirms and fits in with his subsequent report 'I heard a crash', taken in its historical use, counts against his having *dreamt* the crash. To accept his report in its historical sense is to reject it in its dream-telling sense, and *vice versa*.

Perhaps I should say that this is the *main tendency* in these two uses of psychological sentences, although border-line cases occur (as will be noted in a moment)

in which one hardly knows what to say. Also it is necessary to observe a difference between 'I heard a crash', used to report an experience, and 'I must have heard a crash', used as a causal explanation. If I had a dream in which I heard a crash, and then I found out on waking up that a vase fell during the night, I might make the conjecture, 'I must have heard the crash'—meaning that the noise probably caused me to hear a crash in my dream. There is no incompatibility between the dream report 'I heard a crash' and the causal hypothesis 'I must have heard a crash'. But there is one between the dream report and 'I heard a crash', (not 'I *must* have heard a crash'), used in the historical sense to report an experience.

The feeling of suffocation cited by Yost and Kalish is equivocal when considered as belonging to the content of a dream. The asthma victims are supposed to *be* suffocating and this could hardly be supposed unless their breathing was violently laboured and they showed physical distress. They are not therefore fully asleep, although they are not awake. It would not be right to say, without some qualification, that they *dreamt* they were suffocating when obviously they *were* suffocating. Their condition falls in a doubtful border region between being fully asleep and not being fully asleep. One can describe the thing only by means of some makeshift formula such as 'Their feelings of suffocation are partly dreamt and partly real'. Because there is a criterion in present behaviour for this feeling of suffocation it does not belong to the content of a dream, in that pure sense of 'dream' that has as its sole criterion the testimony of the awakened person.

Similar considerations apply, *mutatis mutandis*, to the example of nightmare imagined by Brown. We are told that the sleeper 'thrashes about in bed, screams, and eventually awakes with a pervading sense of anxiety that remains with him all day. He describes this as being a *continuation* of the anxiety he felt in his nightmare' (Brown, p. 48). But the continuity of sensations and emotions is not very puzzling or interesting when what we are given is a transition between sleep-like states and states of full awakedness, and where the criterion of continuity is more or less similar behaviour in the two states. Continuity presents a problem when the transition is between being fully asleep and fully awake, and where the sole criterion of continuity is the awakened person's testimony. It is to this problem of continuity I have addressed myself.

DREAMS AND SCEPTICISM

I TURN now to a philosophical problem traditionally associated with the topic of dreams. In Chapter 1 we noted Descartes' claim that he had often been *deceived* in sleep by dreams and his assertion that there are 'no certain indications' by which one may discern whether one is awake or asleep. Socrates asks Glaucon, 'Does not dreaming, whether one is awake or asleep, consist in mistaking a semblance for the reality it resembles?' (Plato, (1), v. 476), and it is implied that the answer is plainly affirmative. Socrates puts to Theætetus the question, 'What evidence could be appealed to, supposing we were asked at this very moment whether we are asleep or awake?', and the latter replies, 'Indeed, Socrates, I do not see by what evidence it is to be proved; for the two conditions correspond in every circumstance like exact counterparts' (Plato, (2), 158b-158c). In his *Objections* to the *Meditations*, Hobbes says 'It is sufficiently obvious from what is said in this Meditation that we have no criterion for distinguishing dreaming from waking and from what the senses truly tell us'; and he even chides Descartes for boring his readers with mention of this well known truth:

Since Plato and other ancient Philosophers have talked about this want of certitude in the matters of sense, and since the difficulty in distinguishing the waking state

from dreams is a matter of common observation, I should have been glad if our author, so distinguished in the handling of modern speculations, had refrained from publishing those matters of ancient lore (Descartes, (2), II, p. 60).

Russell has claimed that 'it is obviously possible that what we call waking life may be only an unusually persistent and recurrent nightmare' (Russell, (2), p. 94). In a later work he relates a dream in which he saw a ruined church and goes on to remark that his seeing a ruined church in his dream was

an experience intrinsically indistinguishable from that of seeing a ruined church when awake. It follows that the experience which I call 'seeing a church' is not conclusive evidence that there is a church, since it may occur when there is no such external object as I suppose in my dream. It may be said that, though when dreaming I may *think* that I am awake, when I wake up I *know* that I am awake. But I do not see how we are to have any such certainty; I have frequently dreamed that I woke up; in fact once, after ether, I dreamed it about a hundred times in the course of one dream . . . I do not believe that I am now dreaming, but I cannot prove that I am not. I am, however, quite certain that I am having certain experiences, whether they be those of a dream or those of waking life (Russell, (1), pp. 171-172).

The topic of dreams has played a major role in the history of the philosophical problem of the existence of bodies (of an 'external world'). The apparent fact that dreams are, or could be, the 'exact counterparts' of waking experiences seems to provide a decisive proof that we do not 'directly' perceive bodies and that, as Hobbes says, we lack 'certitude in the matters

of sense'; but furthermore it seems to establish the *possibility* that there are no bodies at all. Philosophers of an idealistic or phenomenalist inclination have relied heavily on these consequences to support their theses, while those of a realistic tendency have been embarrassed and perplexed by them. The centre of the difficulty lies in the question 'How can I know at this moment whether I am dreaming or awake?' The most familiar solution proposed makes use of a principle of 'coherence', 'consistency' or 'agreement'. Descartes, Leibniz, Russell, Broad and Ayer have all relied on this principle, the meaning of which we shall see in a moment.

Apparently there is a contemporary tendency to misread Descartes, for we hear much of his 'lament' that it is impossible to distinguish dreaming from waking. But in *Meditation VI* he declares that this philosophical doubt is 'hyperbolic and ridiculous'; in his *Reply* to Hobbes he says that the sceptical arguments of *Meditation I*, including the one based on dreams, were put there

partly that I might prepare my readers' minds for the study of intellectual matters and for distinguishing them from matters corporeal, a purpose for which such arguments seem wholly necessary; in part also because I intended to reply to these very arguments in the subsequent *Meditations*; and partly in order to show the strength of the truths I afterwards propound, by the fact that such metaphysical doubts cannot shake them (Descartes, (2), II, pp. 60-61);

and in his *Reply* to Gassendi he plainly states that (sometimes at least) when we are asleep 'we perceive

that we are dreaming' (*Ibid.*, p. 212). Descartes' actual view was that it is theoretically possible for anyone to determine whether he is asleep or awake. It is sufficient for this that one should compare and carefully relate one's 'perceptions' and draw cautious inferences from them. Part of his aim in the *Meditations* was to refute the belief that it is 'metaphysically' or 'logically' possible that even when one's perceptions fit perfectly into a coherent system one may still be deceived in a dream. If this were so God would be a deceiver, which is impossible. Leibniz agreed with Descartes that it is the coherence of perceptions ('appearances', 'phenomena') that determines whether they belong to waking reality or to dreams; but he held that we can have only probability and not 'absolute' ('metaphysical', 'logical') certainty on this point:

But it must be confessed that the proofs of real phenomena which thus far have been brought forward, howsoever united, are not demonstrative; for, although they have the greatest probability, or, as is commonly said, produce a moral certainty, they, nevertheless, do not create a metaphysical certainty, so that the assertion of the contrary implies a contradiction. And thus, by no argument can it be absolutely demonstrated that there are bodies, nor anything keep certain well-ordered dreams from being objects to our mind, which are considered by us as true, and on account of the agreement among themselves with respect to use are equivalent to truths. Nor is the argument of great weight, as they commonly allege, that thus God would be a deceiver . . . (Leibniz, p. 719).¹

¹ These remarks come from his short paper entitled 'On the Method of Distinguishing Real from Imaginary Phenomena'.

And in the *New Essays* he says that 'it is not impossible, metaphysically speaking, that there may be a dream continuous and lasting like the life of a man' (*Ibid.*, p. 422).

In opposition to this is Descartes' assertion in his *Principles* that

there are some, even among natural things, which we judge to be absolutely, and more than morally, certain. This certainty is founded on the metaphysical ground that as God is supremely good and cannot err, the faculty which He has given us of distinguishing truth from falsehood, cannot be fallacious so long as we use it aright, and distinctly perceive anything by it. Of this nature are mathematical demonstrations, the knowledge that material things exist, and the evidence of all clear reasoning that is carried on about them (Descartes, (2), I, pp. 301-302).

The best statement of the coherence principle, to my knowledge, is by Descartes at the very end of the *Meditations*:

I ought to set aside all the doubts of these past days as hyperbolical and ridiculous, particularly that very common uncertainty respecting sleep, which I could not distinguish from the waking state; for at present I find a very notable difference between the two, inasmuch as our memory can never connect our dreams one with the other, or with the whole course of our lives, as it unites events which happen to us while we are awake. And, as a matter of fact, if someone, while I was awake, quite suddenly appeared to me and disappeared as fast as do the images which I see in sleep, so that I could not know from whence the form came nor whither it went, it would not be without reason that I should deem it a spectre or a phantom formed by my brain (and similar to those which

I form in sleep), rather than a real man. But when I perceive things as to which I know distinctly both the place from which they proceed, and that in which they are, and the time at which they appeared to me; and when, without any interruption, I can connect the perceptions which I have of them with the whole course of my life, I am perfectly assured that these perceptions occur while I am waking and not during sleep. And I ought in no wise to doubt the truth of such matters, if, after having called up all my senses, my memory, and my understanding, to examine them, nothing is brought to evidence by any one of them which is repugnant to what is set forth by the others (*Ibid.*, pp. 198-199).

Leibniz, addressing himself to the question of how we can tell which 'phenomena' ('appearances') are 'real', says that 'the truth of sensible things' consists 'only in the connection of phenomena, which must have its reason and is that which distinguishes them from dreams'; and again,

I think the true *criterion* concerning the objects of the senses is the connection of the phenomena, i.e. the connection of that which takes place in different places and times, and in the experience of different men who are themselves, each to the others, very important phenomena in this respect (Leibniz, pp. 421 & 422).

One aspect of the 'connection of the phenomena' that Leibniz emphasizes is 'success in prediction':

The most powerful proof of the reality of phenomena, which, indeed, alone suffices, is the success in predicting future phenomena from the past and present... Nay, although this entire life were said to be nothing but a dream, and the visible world nothing but a phantasm, I

should call this dream or phantasm real enough, if, using reason well, we were never deceived by it... (*Ibid.*, pp. 718-719).

The thought of the last sentence appears to be exaggerated, for Leibniz immediately goes on to state that this 'proof' yields only 'the greatest probability' and not 'metaphysical certainty'.

Russell affirms the coherence principle very explicitly:

Objects of sense, even when they occur in dreams, are the most indubitably real objects known to us. What, then, makes us call them unreal in dreams? Merely the unusual nature of their connection with other objects of sense (Russell, (2), p. 85).

It is only the failure of our dreams to form a consistent whole either with each other or with waking life that makes us condemn them. Certain uniformities are observed in waking life, while dreams seem quite erratic (*Ibid.*, p. 95).

It would appear to be implied that a person can find out whether he is dreaming or awake by noting the nature of the connection of his present 'perceptions' or 'objects of sense' with other past and present ones, although Russell would agree with Leibniz that the conclusion could have probability only and not absolute certainty, both of them being at odds here with Descartes. All three agree, however, that it is by taking note of the *connection* of 'the phenomena' that one can tell whether one is awake or dreaming. Many other philosophers would accept this view.

THE PRINCIPLE OF COHERENCE

THERE is, *prima facie*, a simple but devastating objection to the use of the coherence principle for finding out whether one is awake or dreaming, and it is surprising that either it has not occurred to the philosophers who accept the principle or, if it has, that they have said nothing about how to deal with it. Making use of the principle consists in noting whether certain 'phenomena' presented to one are connected in the right ways with other phenomena, past, present and future. The objection that should occur to anyone is that it is possible a person should *dream* that the right connections hold, *dream* that he *connects* his present perceptions with 'the whole course of his life'. The coherence principle tells us that we are awake if we can make these connections and asleep in a dream if we cannot: but how does the principle tell us whether we are noting and making connections or dreaming that we are? It seems to me that obviously it cannot and therefore the principle is worthless. I suspect that the principle has been accepted without any very serious consideration of its operation because philosophers have assumed that it *must* be possible to tell whether one is awake or asleep (at least with probability) and also it has seemed to them that there *could* not be a test for this other than coherence.

Without thinking it through they have supposed that coherence works as a test, because it has to work.

Even if it is assumed that there is some way of determining whether one is awake or asleep the coherence principle is useless. But now I wish to make a criticism of it that is more consonant with the thought of this monograph. In Chapters 2, 3, 4 and 9 it was demonstrated that the sentence 'I am asleep' cannot have a use that would be homogeneous with the normal use of the sentence 'He is asleep'. The sentence 'I am asleep', no matter how respectable in appearance was shown to be an inherently absurd form of words. It is impossible that there should be a criterion for saying that someone *understands* how to use that sentence to make a judgment about his present state, and from this it follows that the very notion of judging that oneself is asleep is unintelligible. Now it is easy to see that these same results hold for the sentence 'I am dreaming'. We are interested in dreaming in the sense in which it implies being asleep.¹ If 'I am dreaming' could express a judgment it would imply the judgment 'I am asleep', and therefore the absurdity of the latter proves the absurdity of the former. It was also shown (Chapter 9) that the idea of someone's making *any* judgment while asleep is unintelligible, and this result holds of course for the supposed judgment that one is dreaming.

Consequently the famous philosophical question, 'How can I tell whether I am awake or dreaming?', turns out to be quite senseless since it implies that it is possible to *judge* that one is dreaming, and this

¹ And not, for example, in the sense that it has in the popular song 'I'm Dreaming of a White Christmas'.

judgment is as unintelligible as the judgment that one is asleep. Furthermore, the question appears to presuppose that one might be able to *tell* that one is dreaming, which is double nonsense: for this would mean that one made an inherently unintelligible judgment while *asleep*. The coherence principle is addressed to the above question and the advocates of the principle must assume the question to be a legitimate one. They have committed themselves, therefore, to these absurd implications.

But those who hold to the coherence principle must bear an even heavier weight of nonsense, if that is possible. In Chapter 10 it was shown that the proof that making a judgment while asleep is an unintelligible notion applies, *mutatis mutandis*, to all other mental acts and to all mental passivities, and indeed to everything that we should wish to call 'mental', except dreaming. That someone reasoned, concluded, believed, tested, pondered, perceived, knew, decided something, while asleep—would all be assertions without meaning in the sense that nothing could count for or against their truth. The coherence principle requires, however, that some meaningless assertions of this sort should be true. Descartes says that when he *perceives* something that he can *connect* with the whole course of his life (as he *remembers* it) then he is *assured* that he is awake and not asleep. By implication, if he *perceived* something and *tried* to connect it with the rest of his life (as he *remembered* it) but *saw* that it did not fit in, then he would be *assured* that he was *asleep*! Descartes is committed by his principle, therefore, to holding that a number of meaningless assertions might be true.

As a recent example of the absurdity to which the coherence principle leads, consider some remarks by Ayer. He makes the familiar assertion that what leads us to 'pronounce our dream sensations to be delusive' is not that they are 'intrinsically different' from waking sensations but that 'they do not fit into the general order of our experience'. This is how one finds out that one *was* dreaming, and Ayer asks whether a test of this kind can show me that I *am* dreaming. His reply is that there cannot be a 'conclusive demonstration' because

However many favourable tests I may make, the possibility still remains that my subsequent experiences will consistently be such as to make me conclude that the perceptions that I had to my own satisfaction proved to be veridical were not so really, and that I was dreaming after all (Ayer, pp. 42-43).

Ayer takes Leibniz's view that probability is the best one can have here:

I may find among my sense-data the relations that justify me in grouping them to form material things; I may apply the authorized methods for assigning to these things their 'real characteristics'; I may even have such experiences as I should ordinarily describe by saying that I was making use of the criteria of measurement; and still I may wake to find that I have been dreaming all along . . . (*Ibid.*, p. 273).

But the best is good enough:

So long as the general structure of my sense-data conforms to the expectations that I derive from the memory of my past experience, I remain convinced that I am not living in a dream; and the longer the series of successful predictions is extended, the smaller becomes the probability that I am mistaken (*Ibid.*, p. 274).

Here we have it explicitly maintained that while a person is asleep he can raise questions, make tests, apply methods, discover relations, make predictions, draw conclusions! And despite his phrase 'in the course of a dream', Ayer clearly does not want to mean merely that a person might *dream* that he did those things. He intends those sentences to be understood in their historical and not their dream-telling sense. The latter, however, is the only sense they could have here, since it is premised that the man is asleep. And as MacDonald says, 'It makes no sense to assert that one could employ any confirming technique in a dream. For one would but dream such employment' (MacDonald, p. 205). Dreaming that one makes a prediction is not predicting, dreaming that one makes a test is not testing, dreaming that one draws a conclusion is not concluding. The coherence principle gets its plausibility from the systematic confusing of the historical and dream-telling uses of sentences. Once alerted to this we see the senselessness of supposing that one might have a method for discovering if one is dreaming or might be able to perceive that one is.¹ At the same time we recognize that ancient bugbear of epistemology 'How can I tell whether I am deceived in a dream?', as an absurd product of confusion: for one who is asleep cannot make judgments and therefore not erroneous judgments. The worst that can happen to him in this line is to dream that he is deceived, and that is not so bad.

¹ Here we may note Freud's extraordinary remark (which he thought was a deduction from his theory that a dream is a wish-fulfilment): 'I am driven to conclude that *throughout our whole sleeping state we know just as certainly that we are dreaming as we know that we are sleeping*' (Freud, (2), p. 571).

A man can be deceived by a dream when he awakens from sleep, not when he sleeps. When one awakes with a certain impression and is in doubt whether it belongs to a dream or to reality, one can indeed consider whether this impression *fits in* with what one remembers or presently perceives. Thus coherence has a sensible application to the question '*Was I dreaming?*' but none at all to the question '*Am I dreaming?*'

DO I KNOW I AM AWAKE?

THERE are recognized ways of distinguishing between dreaming and waking (how otherwise should we know how to use and to contrast the words?) . . . ' (Austin, p. 183). I think Austin says this, not because he knows of any 'recognized ways', but because he assumes he can *know* he is awake and so must have some way of doing it. His question, 'How otherwise should we know how to use and to contrast the words?', assumes we do know how. This is partly right and partly wrong: we know how to use the words 'I am awake' but not the words 'I am dreaming'. To speak more exactly, we know that 'I am dreaming' is the first person singular present indicative of the verb 'dream', and that dreaming and waking are logical contraries, and therefore that 'I am dreaming' and 'I am awake' are logical contraries. In this sense we know how to use the sentence 'I am dreaming'. On the other hand, considerations previously mentioned bring home to us that it can never be a *correct* use of language to say (even to oneself) 'I am dreaming'. In this sense we do not know how to use those words. Yet we know that it is sometimes correct to say 'I am awake', and our inclination is to suppose that there must be some way, therefore, of telling that oneself is

awake. In discussing the impossibility (or so he thought) of proving that he was holding his two hands up before him, as he stood in front of his audience at the British Academy, Moore says:

In order to do it, I should need to prove for one thing, as Descartes pointed out, that I am not now dreaming. But how can I prove that I am not? I have, no doubt, conclusive reasons for asserting that I am not now dreaming; I have conclusive evidence that I am awake: but that is a very different thing from being able to prove it. I could not tell you what all my evidence is; and I should require to do this at least, in order to give you a proof (Moore, (2), pp. 29-30).

Moore is greatly perplexed because, try as he might, he cannot bring to mind all (or even *any*, as I think) of his evidence that he is awake; and yet he is convinced that he has conclusive evidence, convinced that he *knows* he is awake.

It is possible for a philosopher to think he knows some proposition, *p*, to be true, because he realizes it would be absurd to affirm that *p* is false or even *possibly* false—although he is quite unclear about the nature of the absurdity. It may have been so with Moore. He realized that it would have been a monstrous absurdity for him to declare that he was not awake or that possibly he was not, and this may have persuaded him that he *knew* he was awake. Having looked into the reasons for the absurdity we see that this conclusion does not follow. For our investigation proves (if we take 'not awake' as equivalent to 'asleep') that nothing counts for or *against* the truth of 'I am not awake', and so nothing counts *for* the truth of 'I

am awake'. If one cannot observe or have evidence that one is *not* awake, one cannot observe or have evidence that one *is* awake. No wonder Moore could not lay his hands on a piece of evidence!

I think a person might have some sort of test for determining whether he is *fully* awake. Suppose his job was to operate a machine and that this was a dangerous thing to do when he was not fully awake. Having just got up from a night's sleep he tries some simple feat of skill, like balancing a coffee cup on the back of his hand, and if he cannot do it he says 'I'm not completely awake yet; I'd better wait a bit before starting that engine'. (Or he might have said 'I'm not awake yet': but this would mean 'I'm half asleep' or 'I'm not completely awake'. Or he might even have said 'I'm still asleep', but anyone would understand him to have meant 'I'm not fully awake'.) Such a test may seem queer, but I see no logical absurdity in it. What makes no sense is that he should apply to himself a test by which he might find out that he is *asleep*, not just half-asleep or not completely awake.

It was remarked previously (Chapter 5) that the actual use of the sentences 'Am I dreaming?' and 'I must be dreaming' is to express surprise at some appearance, and perhaps to question whether things are as they seem or to suggest that they are not. I think those sentences do not differ in their actual use in everyday life from the use of the sentences 'Do my senses deceive me?' and 'It must be that they do'. There are many ways of finding out whether one is presented with a false appearance: getting closer, waiting a bit and looking again, asking someone whether he sees what you do, and so on. It may be

that part at least of the peculiar force of the philosophical question 'How can I tell whether I am dreaming now?', comes from our mixing up the actual use of the question 'Am I dreaming?' with what, in our philosophical thinking, we imagine *ought* to be its use. As a result we confuse the sometimes sensible question 'How can I tell whether that thing over there is actually the way it looks to be?' with the always senseless question 'How can I tell whether I am awake?' There are ways of telling that one is experiencing an hallucination or some sensory illusion, but no ways of telling that one is awake. Philosophers have commonly treated the questions 'Am I hallucinated?' and 'Am I asleep in a dream?' as if they are nearly equivalent, whereas in fact the former has sense in some circumstances and the latter never has sense.

Since I hold that it makes no sense to suppose that a man should doubt or question anything while he is asleep it might be thought that my intention is to provide a demonstrative argument by which anyone who is perplexed by the question 'Am I awake or dreaming?' can determine that he is awake. For can he not argue as follows?: 'I am perplexed as to whether I am awake or dreaming in sleep. But it makes no sense to suppose that I should be perplexed while asleep. Therefore I am awake'. This form of reasoning would not, however, remove the perplexity of a determined philosophical sceptic, since he might say to himself: 'I admit that *if* I am perplexed I am awake; but am I perplexed or do I merely dream that I am?'. If the objection occurred to him: 'Since I am in doubt whether I am really perplexed or merely dream that

I am, I must be awake', he might make to himself this rejoinder: 'I don't know whether I am actually in doubt or just dream that I doubt'. And so on *ad infinitum*. Nothing can force him to affirm that he is perplexed or in doubt and therefore nothing can force him to find in the above reasoning a demonstration that he is awake and not dreaming.¹

It is not my aim, however, to propose a piece of reasoning by which someone can arrive at the knowledge that he is awake. My contribution (if it is one) to this renowned sceptical problem has been to try to show that the sentence 'I am not awake' is strictly senseless and does not express a possibility that one can think. This is to say that when the sentence 'I am awake' is used to make a statement, there is not another possible statement which is its proper negation. There are not two things for me to decide between, one that I am awake the other that I am not awake. There is nothing to decide, no choice to make, nothing to find out. I cannot pass from not knowing whether I am awake or dreaming to knowing I am awake. To say 'I don't know whether I am awake or dreaming' would be to imply that 'I am dreaming' makes sense and expresses a possibility. Therefore the sentence 'I don't know whether I am awake or dreaming' cannot be a proper description of my condition, being itself a piece of nonsense. There cannot be such a thing as my lacking knowledge of whether I am awake or dreaming and so there cannot

¹ I am indebted to Mr. Geoffrey Warnock for this observation. Apparently some readers of my article 'Dreaming and Skepticism' (see page 91, fn.), thought my intention was to provide a method of proving to oneself that one is awake. It must be admitted that the article is not entirely clear on this point.

be a *transition* from that supposed privation to the knowledge that I am awake. There can be a transition from the belief that the sentence 'I am dreaming' makes sense to the knowledge that it does not, and this I have tried to provide. If someone wants to say that coming to know that the sentence 'I am dreaming' is nonsense is coming to know that one is awake, he is welcome to it, although this cannot fail to be a most misleading thing to say. Certainly you cannot be said to know *by observation* that you are awake: and since the fact that you are awake, when you are, is contingent, it would seem that if you knew it at all it would have to be by observation. You cannot know by observation that you are awake because if you could it would make sense to speak of knowing by observation that you are not awake. It is even more inappropriate to speak of knowing that one is awake than of knowing that one is in pain, for 'I am in pain' has a sensible negation at least. It appears to me that 'I know I am awake' either is redundant, meaning no more than 'I am awake', or else it means: 'The sentence "I am not awake" makes no sense'.

The temptation to hold that one knows by observation that one is awake is very powerful. One is inclined to think of the matter in something like this way: 'If someone, wanting to know whether I am asleep or awake, whispers to me "Are you awake"?, I can reply "Yes, I'm awake"'. In making that reply I apply the word "awake" correctly to my state at the time. How can that be unless I *take note* of that state?' I think the imagery one has here is fairly clear. There are various states of oneself, each having a name. 'Awake' is the name of one of them, 'fear' of another, 'drowsy'

of another, and so on. When I apply 'awake' to myself I *pick out* one state from others having different names. In order to pick it out I must take note of it, I must *see* it.

I think we go wrong in supposing that when I answer 'I'm awake', I *apply the word 'awake' correctly to my state at the time*—although that sounds unexceptionable. For what would it mean to apply that word *incorrectly* to my state at the time? When we say 'I'm awake' we are not *distinguishing* between states. It is not a matter of 'picking out' anything. When you say 'I'm awake' you are not reporting or describing your condition. You are *showing* someone that you are awake. There are countless other ways of doing this (one way would be to exclaim 'I'm not awake'); but the conventionally correct way of doing it with words is to say 'I am awake'.

The anciently perplexing question 'How can I tell whether I am awake or dreaming?' seems to me to obtain its force from two errors. One is that of supposing that dreaming and waking might be 'exact counterparts', this being an error that comes from confusing the historical and dream-telling senses of first person singular psychological sentences in the past tense. The other is that of thinking that one *must* be able to know, to *see*, that one is awake. We are thus brought to a state of paralysis, caught as it were in the grip of contradiction. We think we must *know* this, yet we realize that we could not. I have tried to expose both errors.

DREAMS AND PSYCHIATRY

SOME readers of this monograph may think that my views conflict with the conception of the nature and significance of dreaming commonly held by psychoanalysts, and that this is refutation enough. I am inclined to agree that when Freud thought about the place of dreams in the general theory of psychoanalysis, he pictured it in a way that is at odds with some of my conclusions. 'The dream is the mind's reaction in sleep to the experience of the previous day' (Freud, (1), p. 114). The dream is 'the life of the mind during sleep', and 'dreams are the reaction to a stimulus disturbing sleep' (*Ibid.*, pp. 79 and 82).

We have learnt that the function of dreams is to protect sleep; that they arise out of two conflicting tendencies, of which the one, the desire for sleep, remains constant, whilst the other endeavours to satisfy some mental stimulus; that they have two main characteristics, i.e. they are wish-fulfilments and hallucinatory experiences (*Ibid.*, p. 118).

On the face of it he seems to be supposing a number of things that I have rejected as nonsensical, e.g. that one could, while asleep, have an hallucination or 'endeavour to satisfy some mental stimulus'. If I am right then a good deal of Freud's theory of dreams needs to be rewritten.

On the other hand I believe that there is no conflict at all with his theory of the *practice* of psychoanalysis, as far as I understand it. I have emphasized the telling of a dream as the criterion of the occurrence and content of a dream. Dreaming is not to be conceived of as something logically independent of dream reports. Now Freud discovered that important information about his patients could be obtained by extending the technique of free association to their dream reports. In giving an account of his method of interpreting dreams he makes this interesting remark:

Any disadvantage resulting from the uncertain recollection of dreams may be remedied by deciding that exactly what the dreamer tells is to count as the dream, and by ignoring all that he may have forgotten or altered in the process of recollection (*Ibid.*, p. 76).

What he is saying, in effect, is that if one tries to conceive of a dream as a process or occurrence quite independent of the dream report, to which the latter may or may not correspond, then psychoanalytic practice has nothing to do with such a conception. The American psychiatrist, Harry Stack Sullivan, says the following:

For the purposes of my theory, one never, under any circumstances, deals directly with dreams. It is simply impossible. What one deals with in psychiatry, and actually in a great many other aspects of life, are recollections pertaining to dreams; how closely, how adequately these recollections approximate the actual dreams is an insoluble problem, because as far as I know there is no way to develop a reasonable conviction of one-to-one correspondence between recollections of dreams and dreams themselves (Sullivan, pp. 331-332).

There is a strong indication here of a philosophical muddle about the 'one-to-one correspondence'. But what is valuable in these remarks for the present point is the implication that psychiatry is not concerned with this 'insoluble problem', and in its workaday therapy is content to use the recollection of a dream as the criterion of the occurrence and content of the dream.

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