

Contents

Contents	1
1 Reading	3
2 Capture the Cutting Stones	11
The Knight's Move Tesuji	12
The Loose Ladder Tesuji	14
The Slapping Tesuji	15
The Clamping Tesuji	17
The Nose Tesuji	19
The Gross-Girt Tesuji	21
More Problems	23
3 Amputate the Cutting Stones	27
Snap-back	27
The Throw-in Tesuji	29
The Squeeze Tesuji	29
Ladder-Building	29
The Placement Tesuji	29
More Problems	29
4 Ko	31
5 When Liberties Count	33

Chapter 1

Reading

The problems in this book are almost all reading problems. They are not going to tax your judgement by asking you to find the largest point on the board, choose the direction of play, or ponder the relative merits of profit and outer strength. Instead, they are going to ask you to work out sequences of moves that capture, cut, link up, make good shape, or accomplish some other clear tactical objective.

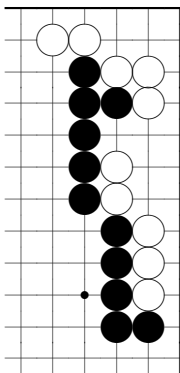
A good player tries to read out such tactical problems in his head before he puts the stones on the board. He looks before he leaps. Frequently he does not leap at all; many of the sequences his reading uncovers are stored away for future reference, and in the end never carried out. This is especially true in a professional game, where the two hundred or so moves played are only the visible part of an iceberg of implied threats and possibilities, most of which stays submerged. You may try to approach the game at that level, or you may, like most of us, think your way from one move to the next as you play along, but in either case it is your reading ability more than anything else that determines your rank.

There is an element of natural talent involved, but for the most part reading ability is developed through study and experience. As you become familiar with various positions and shapes you will find certain moves, called *tesuji*, that come up again and again, and once you learn them your reading will become much faster and more accurate. There are also certain habits of thinking to be acquired, which this chapter will try to illustrate.

The first principle in reading is to start with a definite purpose. There is no better way to waste time than to say to yourself, ‘I wonder what happens if I play here’, and start tracing out sequences aimlessly. Tactics must serve strategy. Start by asking yourself what you would like to accomplish in the position in question, then start hunting for the sequence that accomplishes it. Once you have your goal clearly in mind the right move, if it exists, will be much easier to find.

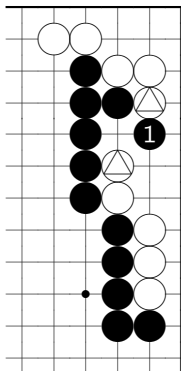
With the goal set, reading is a matter of working your way through a mental tree diagram of possible moves. You should be systematic and thorough. Start with the obvious move, followed by the obvious counter-move, the obvious counter-move to that, and so on until you have a sequence that ends in success for one side and failure for the other. Then take the last move made by the side that failed and try other possibilities. If they all fail too, go back to the same side’s move before that and do the same thing again. It is important to work from the back toward the front of the sequence, to avoid leaving things out. Eventually you will arrive at a conclusion, and hopefully it will be correct.

As an example, let us take the question of whether Black can cut off the five white stones in the lower portion of Dia. 1. Both players want to know the answer to this question, but let us imagine ourselves as Black and follow his thought processes as he reads the problem out.

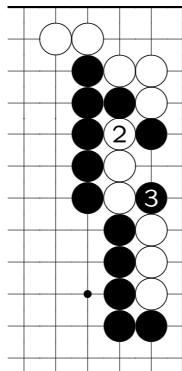


Dia. 1: Black to Play

Since he is trying to separate the two stones marked \triangle , the obvious move to start with is 1 in Dia. 2. The obvious counter-move, White 2 in Dia. 3, fails because of Black 3. Black 1 looks promising, but we must consider other possible counter-moves by White.



Dia. 2

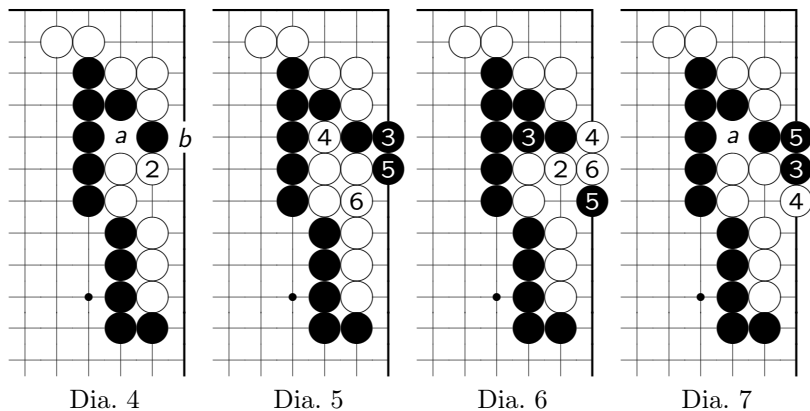


Dia. 3

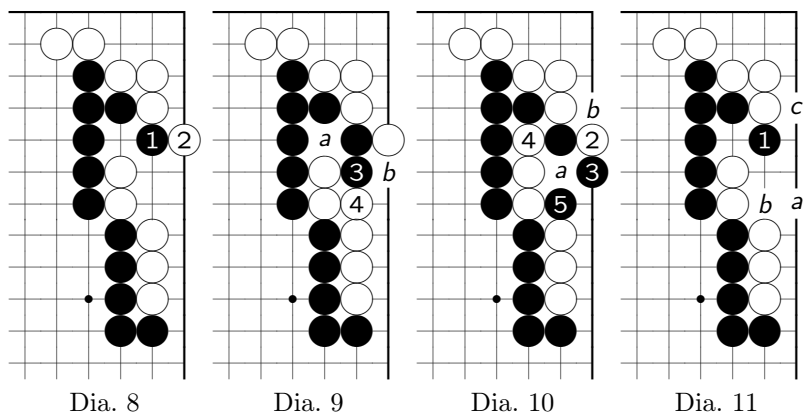
The next most obvious counter-move is White 2 in Dia. 4, which aims at going over the black stone at *a* or under it at *b*. For Black 3 we start by blocking White's path as in Dia. 5 and letting him cut. Black gives atari at 5, White connects at 6, and Black is dead. Are there any better possibilities for Black 5? No, so this Black 3 fails. Next comes Black 3 in Dia. 6. After White links underneath Black has what looks like a tesuji at 5, but it comes to nothing. This Black 3 fails too.

By now Black may be ready to conclude that White 2 works, but he still has other Black 3's to try. Sooner or later the hane at 3 in Dia. 7 is going to come to light. This is a real tesuji, the eye-stealing tesuji, and if you know it you probably spotted it immediately. It stops White from linking up, and White cannot cut at *a* because of shortage of liberties, (that is, he would be putting himself into atari). This is still true after White 4 and Black 5; the white stones are cut off and dead.

So the White 2 we have been investigating in Dias. 4 to 7 turns out to be a failure; that only means that other, less obvious White 2's have to be tested. The next candidate might be the hane shown in Dia. 8.



If Black plays 3 in Dia. 9, White will connect at 4 and be threatening to link up with either *a* or *b*. Black cannot defend against both of these threats, so he has failed. In this kind of situation *a* and *b* are called *miai*; if one player takes one of them, the other player can take the other.

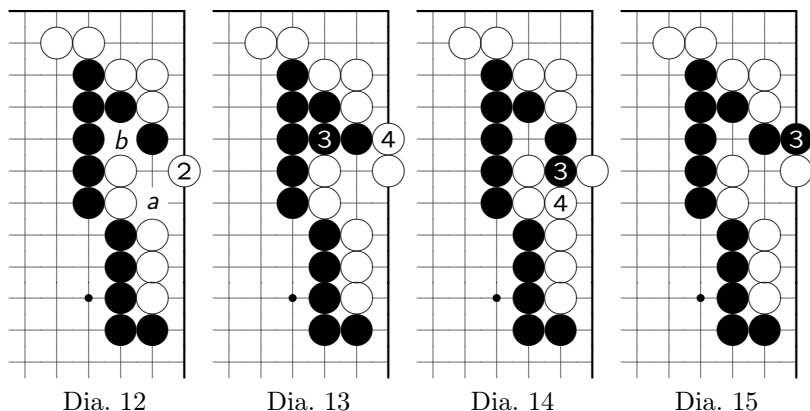


Black 3 in Dia. 9 failed, but Black 3 in Dia. 10 succeeds. If White cuts at 4, Black has a snap-back at 5; if White plays 4 at *a*, Black captures at *b*; and if White connects at *b*, Black can play 4, 5, or *a*. This eliminates the hane for White 2.

White's resources are fast disappearing, and we must now turn to rather unlikely-looking choices, such as *a*, *b*, and even *c* in Dia. 11, for White 2. Each of these, however, can quickly be eliminated. See if you can find answers to them for yourself; only White *a* is at all tricky, (it invites a mistake in which Black captures two of the white stones but misses the rest).

If you have dealt with the moves in Dia. 11, then a total of six White 2's have been shown to fail. Does that mean that Black 1 is established? Not yet, for there is one White 2 left, the least obvious and strongest move of all.

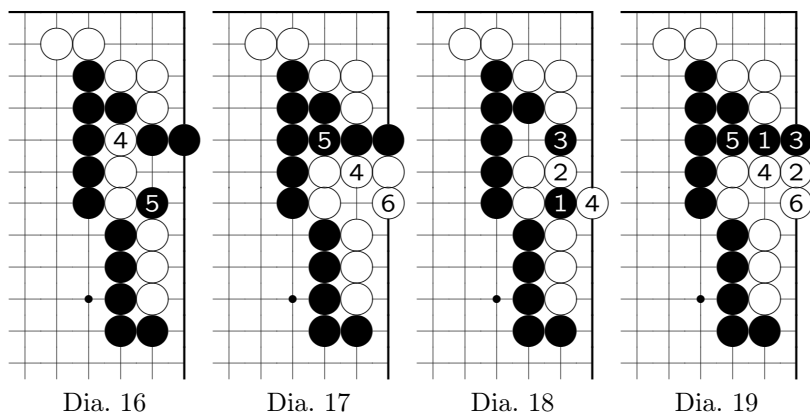
The last arrow in White's quiver is the one-point jump to the edge in Dia. 12. It guards the cutting point at *a* and hence threatens to cut at *b*. If Black connects at 3 in Dia. 13, White can link up with 4, and Black 3 in Dia. 14 runs into a move that we have seen before. These two Black 3's are failures.



Boldness may succeed where caution fails, so next Black tries blocking White's way directly with 3 in Dia. 15. At first, this seems to work. White cannot cut at 4 in Dia. 16 because Black will cut him right back with 5. Since 4 fails, there is no way White can get through to the corner; he has put up a good fight, but it looks as if he has lost in the end. Just to be on the safe side, however, Black had better doublecheck for an alternative to White 4 in Dia. 16.

And sure enough, there is White 4 in Dia. 17. Black connects at 5 and although White is cut off, he can live by playing 6. There is something maddening to Black about reading to this point, proving that no matter how White answers Black 1 he can be cut off, only to discover that the cut-off group can live. Patiently Black goes on and tests other Black 1's, like the one in Dia. 18, but they all fail. The conclusion he comes to is that Dia. 19 is the best sequence for both sides.

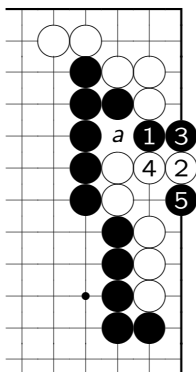
Since he has put so much thought into it, Black may be tempted to play out Dia. 19 even though it is not a real success; at least it gives him some profit in sente, and maybe White will miss the tesuji at 2.



There are two reasons, however, why Black should restrain himself. The first is that moves like these should be saved for use as ko threats. Most games involve at least one ko fight, and the player who squanders his threats before the ko is going to be sorry. If Black leaves the position alone White is not likely to bother making a defensive move, so the opportunity to play 1 will still be there later on.

The second reason is that there is always the chance of having made a reading mistake. Especially in a non-urgent position like this, you can afford to turn your attention elsewhere, then come back later for a second look. Re-examining positions that you have already read out is a good way to spend the time waiting for your opponent to play; it often turns up moves that were missed before.

In the position we are considering, for example, if Black looks again he may finally see 5 in Dia. 20, which destroys White's eye shape while inflicting shortage of liberties on him to keep him from cutting at a. Now he has the truth. He does not have to play 1 at once, but he knows that when the time comes, the white stones are there for the taking.



Dia. 20

When you have a sequence that almost works, like the one in Dia. 19, it is a good idea not to give up on it. Often changing just one move, or changing the order of moves, or reading just one move further is all that is needed.

What about the positions that are simply too hard to read out? As far as possible, they should be left alone. Future developments may alter them, and the unreadable may become readable, and anyway you lose much more by having a lot of stones captured in a sequence that fails than by letting your opponent defend where you could have destroyed him. In the latter case, while your opponent is defending you get two moves in a row elsewhere on the board. In the former case there is no compensation. Sometimes, of course, you have to push ahead blindly, but remember that it is weak players who are always playing in situations they cannot read out, and strong players who refrain from playing even when they have the situation completely read out.

Most of the rest of this book consists of examples of tesuji and problems on which you can practice your reading. One word of warning about the answers to the problems is necessary. In general there will be only one or two answer diagrams, showing how the correct answer succeeds against the opponent's strongest resistance. For the problem read out in this chapter, only the variations of diagrams 7, 20, and perhaps 10 would appear in the answer diagrams. The rest of the reading would be left up to you. Occasionally a wrong answer is shown as a pitfall, and marked 'failure'.

Since the opponent's strongest resistance to the correct answer fails, it will not usually be the best move for him to make in actual play. Faced with Black 1 in Dia. 20, for instance, White's best response is not the 'strongest' move at 2, but rather no move at all. In the endgame White should play the hane, (2 at 3), and connect, a variation that would not appear among the answer diagrams. If you respect your opponent's reading ability you will want to avoid many of the even-numbered moves in the answer diagrams of this book.

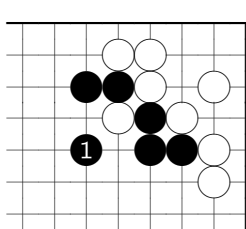
It took us twenty diagrams to get through one problem in this chapter, but most of the problems coming up will not turn out to be so complicated, and even the hard ones should not take so long once you have gotten a grasp of tesuji. The importance of learning tesuji is that you learn where to look for the answer, and can go straight to the move that works without having to waste time thinking about moves that fail.

Chapter 2

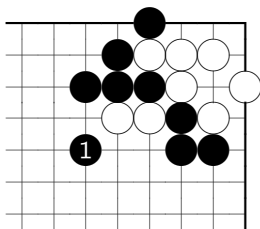
Capture the Cutting Stones

Diagram 1 shows the kind of move that this chapter is about. White has one stone on the outside, partly surrounded by black stones but ready to make a dash for the open. Black 1 traps it, blocking its escape and capturing it.

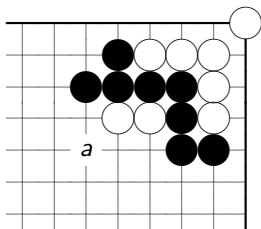
Diagram 2 shows the same type of operation, except that now Black 1 captures two white stones. Try as they may, they cannot escape. In the next few pages you will meet more advanced tesuji for trapping enemy stones out in the open or for running them to earth at the edge of the board.



Dia. 1



Dia. 2

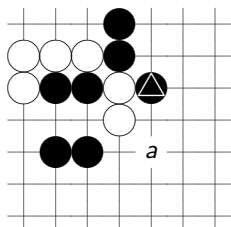


Dia. 3

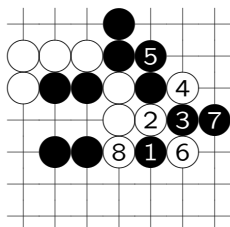
What makes moves like this worth playing is not so much the size of the capture—Black is getting only two points in Dia. 1 and four points in Dia. 2—but the fact that the captured stones were cutting stones. If White, instead of Black, played 1 in Dia. 1 for example, the black stones would be split into two very weak groups, one or the other of which would almost surely die.

Contrast this with Dia. 3, where the two white stones are not cutting stones. Black could capture them with a, but that would be only a four point move of little significance. Black should ignore the enemy stones, extend farther from his position, and try to surround a much larger area.

The Knight's Move Tesuji



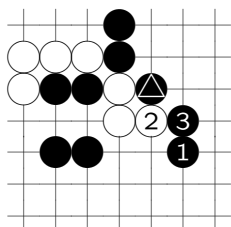
Dia. 1



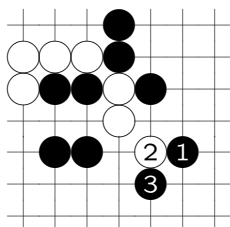
Dia. 2

Dia. 1 Black wants to capture the two white stones in the center. Black a, the obvious move, does not work because White can push out between a and \blacktriangle and escape with a series of ataris.

Dia. 2 Ataris at 4 and 6 spring White free. Fortunately there is a play that succeeds where Black 1 fails.



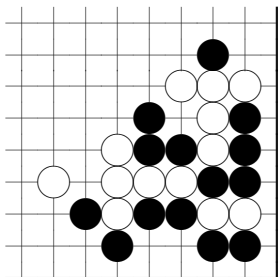
Dia. 3



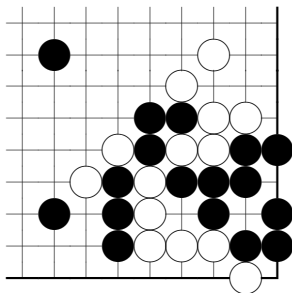
Dia. 4

Dia. 3 This Black 1 is the tesuji; observe its knight's-move relation to Black \blacktriangle , the weak stone that caused the trouble in the previous diagram. After 2 and 3 an atari against Black \blacktriangle would accomplish nothing, and White is trapped much as in Dia. 2 on the previous page.

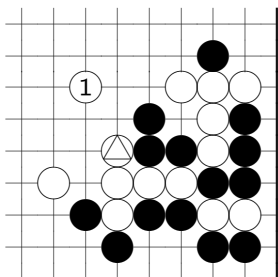
Dia. 4 Nor can White escape this way. Black 3 stops him.



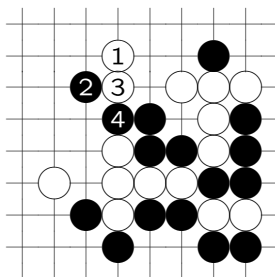
Problem 1. White to play and capture the cutting stones.



Problem 2. White to play and capture the cutting stones.

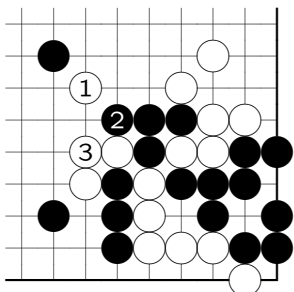


Ans. to Prob. 1

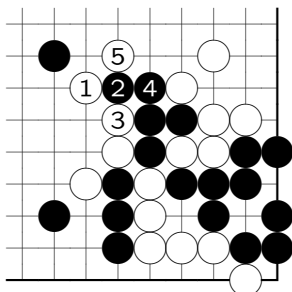


Dia. 1a

Answer to Problem 1. White 1, a knight's move away from the weak stone \triangle , does the job.



Ans. to Prob. 2



Dia. 2a

Answer to Problem 2. White 1 traps the black stones.

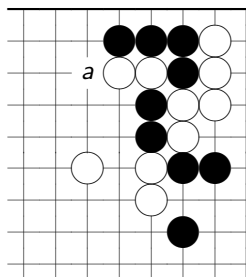
Dia. 1a. This is the wrong knight's move. Black 2 makes a neat escape.

Dia. 2a. If Black plays 2, White has a short ladder.

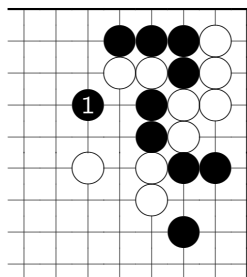
The Loose Ladder Tesuji

Dia. 1. If Black is going to get any kind of result out of this position he has to capture the pair of white stones to the right of *a*, but how? An atari at *a* would not work.

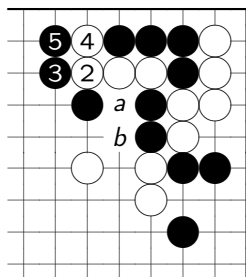
Dia. 2. Black 1 is the tesuji; it sets up a loose ladder.



Dia. 1

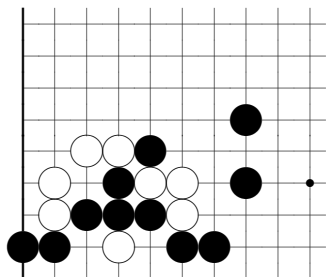


Dia. 2

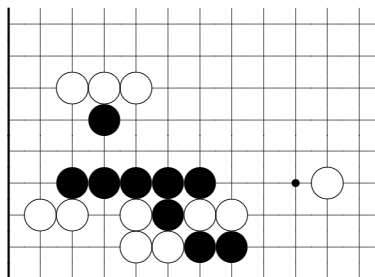


Dia. 3

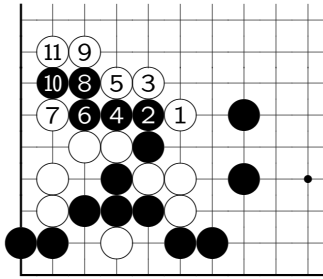
Dia. 3. Black guides White firmly to the edge of the board with 3 and 5, not only trapping the fleeing stones but capturing the whole corner. If at any point White plays *a*, Black *b* puts him in atari and hastens his end.



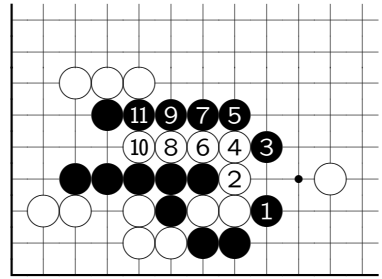
Problem 1. White to play and capture the cutting stones



Problem 2 Black to play and capture White's cutting stones



Ans. to Prob. 1



Ans. to Prob. 2

Answer to problem 1. White 1 and 7 are the key plays.

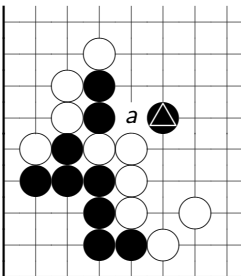
Answer to problem 2. This time the sequence starts with an atari.

The Slapping Tesuji

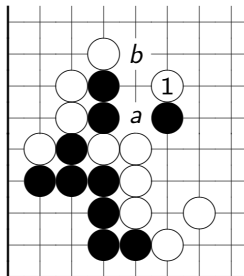
Dia. 1. Black is trying to bring his two stones out into the open with \triangle , (although he is doing it wrong, as will quickly become clear). Can White stop him? The series of ataris, i.e. the ladder, that starts with White *a* is broken by Black \triangle , so White must look for something else.

Dia. 2. In this shape White 1 is the tesuji. It makes White *a* a real threat, so if Black is going to resist he must either connect at a himself or try to slip out with *b*.

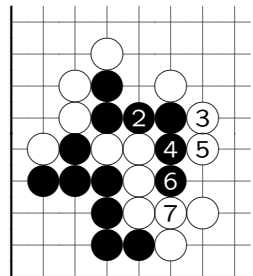
Dia. 3. But if Black connects at 2, White has him in a loose ladder with 3 and the rest.



Dia. 1



Dia. 2

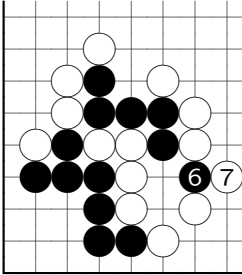


Dia. 3

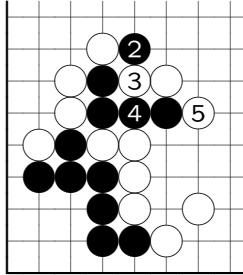
Dia. 4. Black 6 here, an attempt to set up a snap-back, bows before White 7.

Dia. 5. What about the other possible Black 2? White 3 gives atari, and from there on the moves are the same as before, except that the loose ladder becomes an ordinary ladder.

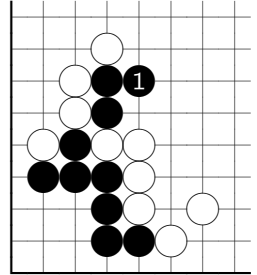
Dia. 6. To return to Black's original move, if he wants to escape he has to make an empty triangle with 1. Empty triangles are bad shape, but at least he has a chance to split White up and attack.



Dia. 4



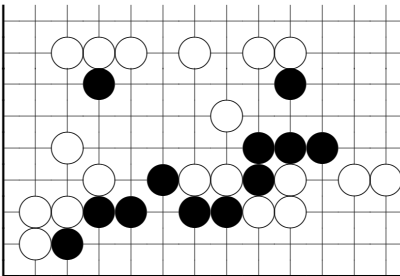
Dia. 5



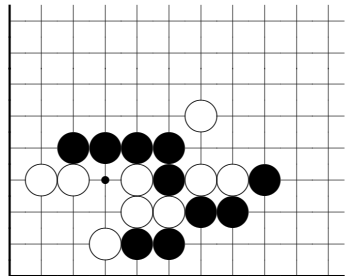
Dia. 6

Problem 1. Black to play and capture the cutting stones.

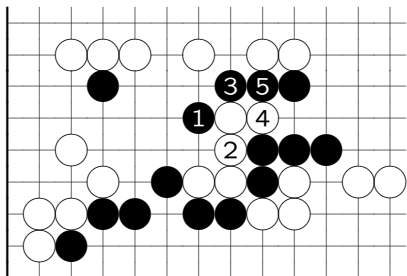
Problem 2. Black to play and capture the cutting stones. Be sure you have read out the whole sequence correctly.



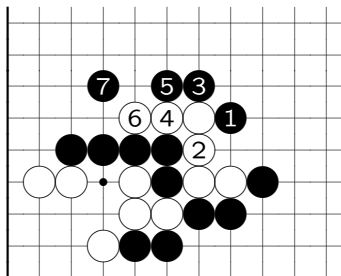
Problem 1



Problem 2



Ans. to Prob. 1



Ans. to Prob. 2

Answer to problem 1. Black 1 is the tesuji, and the rest is simple.

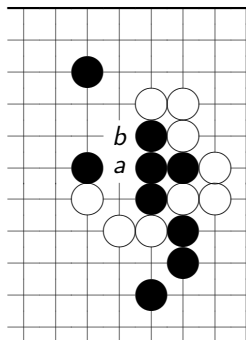
Answer to problem 2. Here the important point, aside from the tesuji at 1, is seeing when to jump ahead. Any move other than 7 would fail.

The Clamping Tesuji

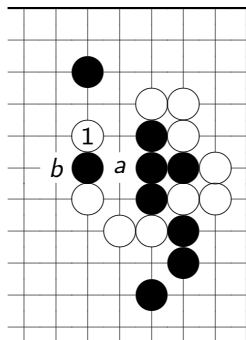
Dia. 1. There may seem to be no way for White to capture anything in this position. If he cuts at *a*, for example, Black gets away with *b*.

Dia. 2. There is a tesuji, however: the clamping move at 1. Its effect is to make miai of *a* and *b*.

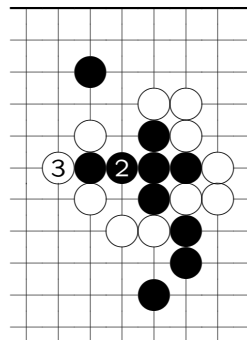
Dia. 3. For Black to connect at 2 is pointless. White 3 leaves him with no room to wriggle.



Dia. 1

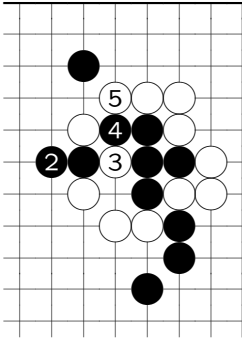


Dia. 2

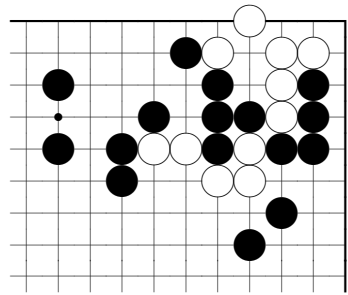


Dia. 3

Dia. 4. But if he extends out with 2, White 3 severs him. Black's 4 does not work because White 5 captures his stones in a snap-back. Similarly, if Black played 2 at 4, White would answer at 5, leaving 2 and 3 as miai. Clamping tesuji do not always involve snap-back, but they are sometimes hard to see, so we have given you three problems this time.



Dia. 4

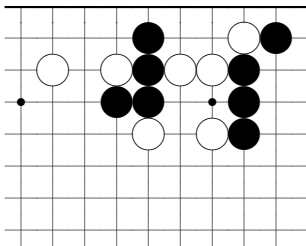


Problem 1

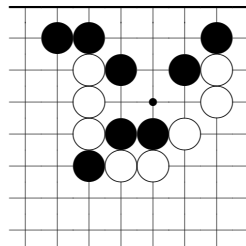
Problem 1. White to play and capture the cutting stones.

Problem 2. Black to play and halt White's escape. Don't be confused by extraneous stones.

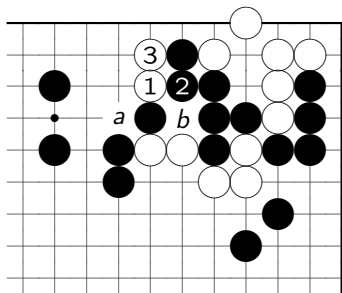
Problem 3. White to play and capture the cutting stones.



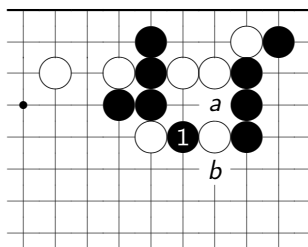
Problem 2



Problem 3



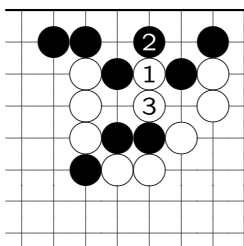
Ans. to Prob. 1



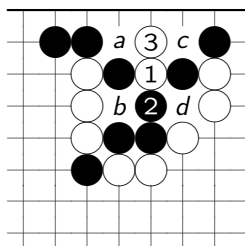
Ans. to Prob. 2

Answer to problem 1. White 1 is the clamping tesuji; it makes *a* and *b* miai. If Black plays 2, White plays 3, and vice versa.

Answer to problem 2. This time Black has to make his clamping move right in between two white stones, but it still works. Again *a* and *b* are miai, and the three white stones above *a* are cut off and done for.



Ans. to Prob. 3



Dia. 3a

Answer to problem 3. White 1 is a surprising tesuji. Black's best response is 2, but White 3 gives atari and if Black connects he will still be in atari.

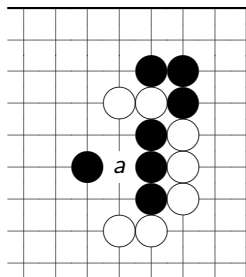
Dia. 3a. Black's play in this diagram only magnifies his loss. After White 3, *a* and *b* are miai on one side and *c* and *d* are miai on the other, and the three stones including Black 2 are captured.

The Nose Tesuji

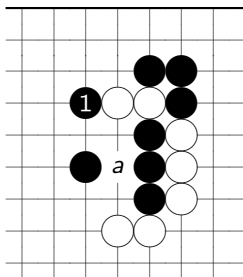
Dia. 1. Black is in a position to capture the upper pair of white stones, but he must be careful because the danger of White *a* is staring him in the face. A non-contact play would be too slow.

Dia. 2. Black 1 hits White squarely on the nose, so to speak. More to the point, it defends against *a* and catches the white stones in a loose ladder.

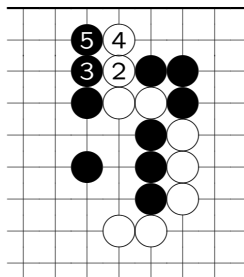
Dia. 3. Black 3 and 5 drive White to the edge of the board and allow him no escape.



Dia. 1



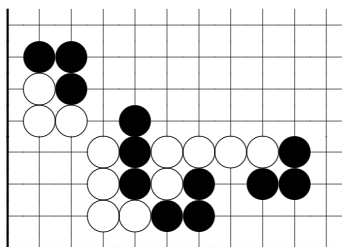
Dia. 2



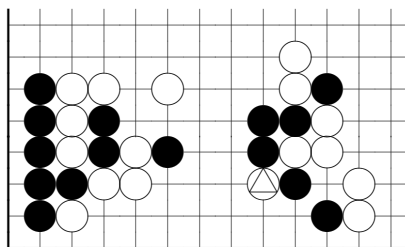
Dia. 3

Problem 1. White to play and capture the cutting stones. As usual, be sure to read out the whole sequence.

Problem 2. Black to play and capture the stone marked \triangle . The nose tesuji is not the first move, but comes later.



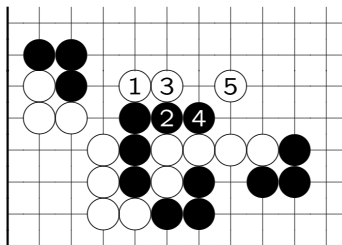
Problem 1



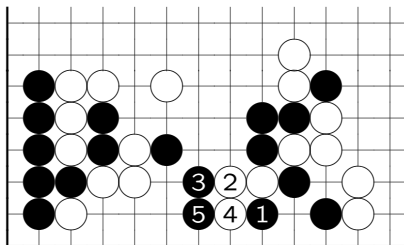
Problem 2

Answer to problem 1. White 1 is the nose tesuji, and 3 and 5 finish the job.

Answer to problem 2. This time the nose tesuji comes at Black 3.



Ans. to Prob. 1



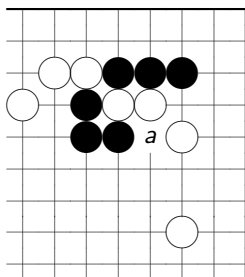
Ans. to Prob. 2

The Gross-Girt Tesuji

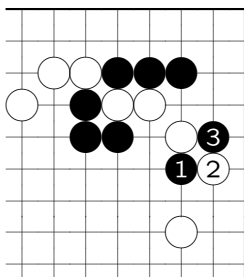
Dia. 1. Black seems to be separated into two groups, a corner one and an outside one, but there is a way for him to link them up and capture the two white stones that stand in between. It would be a fatal mistake for Black to start by giving atari at a. Common sense might tell you that; Black can give atari either at a or from the other side, so he should hold both ataris in reserve and wait until one of them becomes effective.

Dia. 2. The tesuji is the contact play at 1. White's best response is 2, and Black cross-cuts with 3.

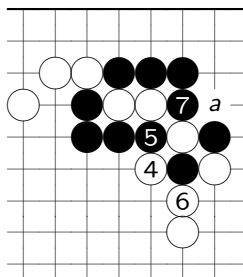
Dia. 3. If White gives atari at 4, Black gives a counter-atari at 5 and White cannot connect at 7 because of shortage of liberties. All he can do is to capture at 6, letting Black have two stones with 7 or a.



Dia. 1



Dia. 2

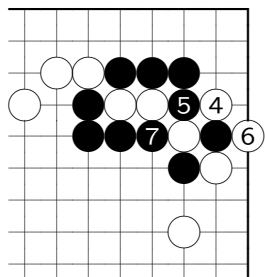


Dia. 3

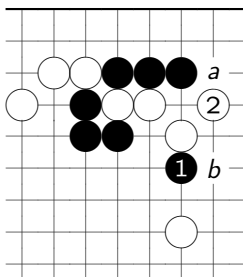
Dia. 4. If White gives atari from the other direction with 4, Black alters 5 accordingly.

Dia. 5. There is one move to watch out for in this shape. Occasionally when Black plays 1 White can resist with 2, threatening *a* and *b*.

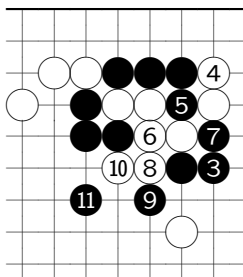
Dia. 6. But in the present position Black can foil White and make a big capture with 3 etc.



Dia. 4



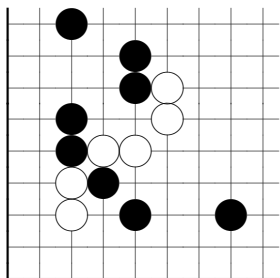
Dia. 5



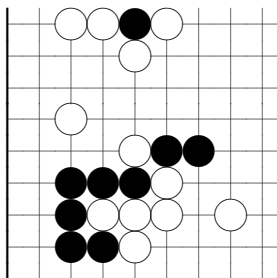
Dia. 6

Problem 1. White to play and capture the cutting stone.

Problem 2. Black to play and capture the cutting stone.



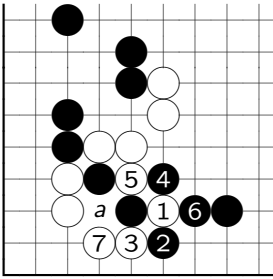
Problem 1



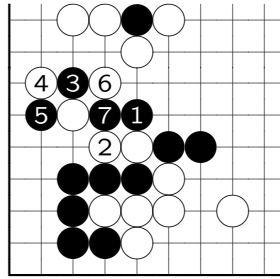
Problem 2

Answer to problem 1. White 1 and 3 are the cross-cut tesuji. After Black 4 to 6, White may prefer to play 7 instead of *a* for the sake of eye shape in the corner.

Answer to problem 2. Black 1 puts the cutting stone in atari, and if White draws out at 2, Black 3 and 5 are the cross-cut tesuji.



Ans. to Prob. 1

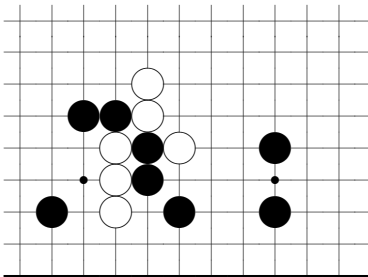


Ans. to Prob. 2

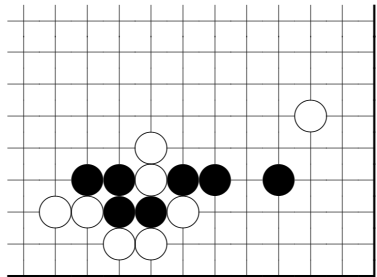
More Problems

The following eleven problems range from the very easy, such as numbers 3 and 4, to the moderately difficult, such as number 11. In each of them the idea is to capture the cutting stones. In one of the problems, (number 1), Black can save his cutting stones if he plays a certain way, but White can get a good result anyhow.

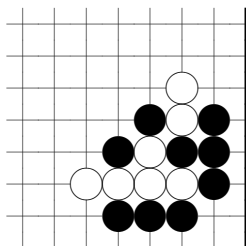
The answers appear briefly on the following two pages. As usual, the answer diagrams show moves that the player who loses the sequence should leave unplayed.



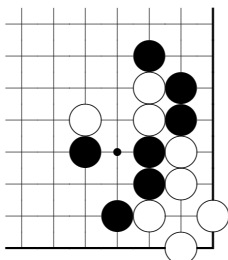
1. White to play



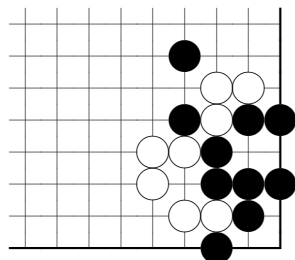
2. Black to play



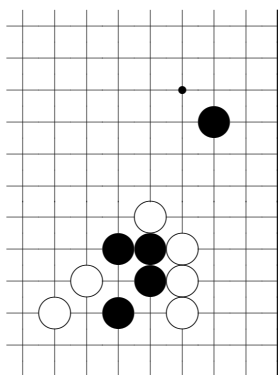
3. White to play



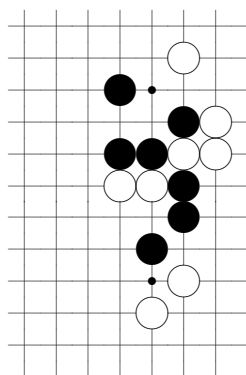
4. Black to play



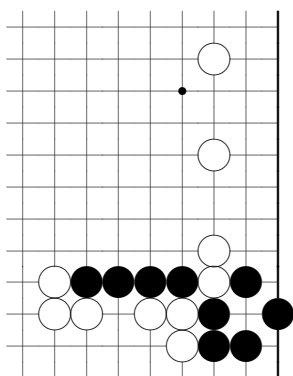
5. White to play

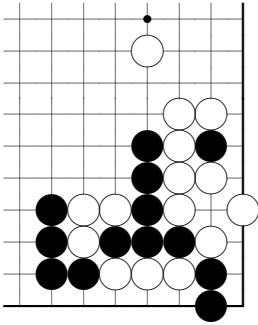


6. White to play

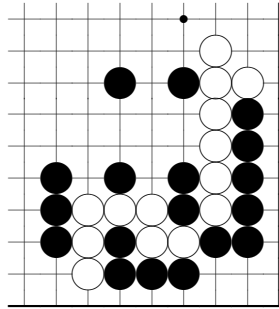


7. Black to play





10. White to play



11. White to play

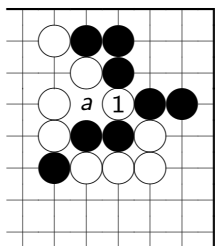
Chapter 3

Amputate the Cutting Stones

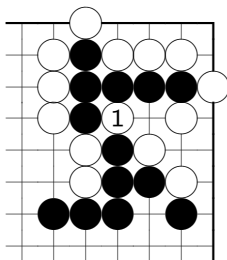
The theme of this chapter is the same as that of the last: capturing small groups of enemy stones. The difference is that whereas before the idea was to capture them by blocking their escape route, the idea now is to capture them by detaching them from a larger body of enemy stones, and the techniques differ accordingly. Usually the target stones will be cutting stones, but we shall not be finicky about going after non-cutting stones on occasion for the sheer profit of capturing them.

Snap-back

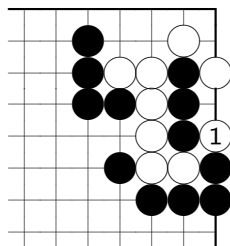
Snap-backs are the first really interesting tactics of the game that most players learn; perhaps you can remember when you first encountered one. For those who may not be sure of the term, the next three diagrams present a quick review.



Dia. 1



Dia. 2

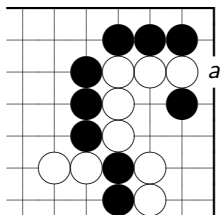


Dia. 3

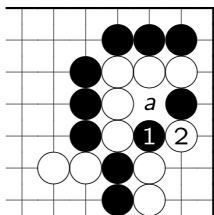
Dia. 1. White 1 is a snap-back capturing move. It puts two black stones in atari. Black could take White 1 by playing *a*, but White would just replay at 1 and capture three stones.

Dia. 2. This is another snap-back pattern. Again Black could capture, but White would just recapture.

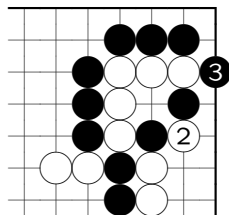
Dia. 3. This is a snap-back at the edge. Now for some applications.



Dia. 4



Dia. 5



Dia. 6

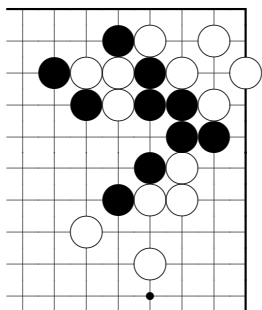
Dia. 4. Black has an opportunity to capture five stones, but surprisingly many players would fail to see it and link underneath at *a* instead.

Dia. 5. Any capture must begin with the cut at 1. At first, however, it looks as if Black 1 fails, for White 2 is atari against it and Black cannot connect at *a*.

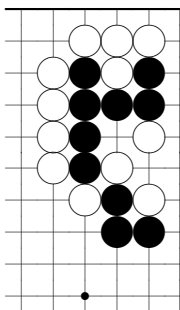
Dia. 6. But all is well. Black answers 2 at 3 and has the five stones in a snap-back.

Problem 1. Black to play and capture.

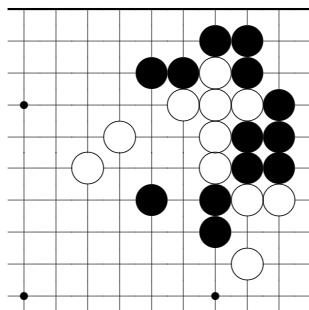
Problem 2. White to play. The cutting has already been done. The question is how to finish the job.



Problem 1

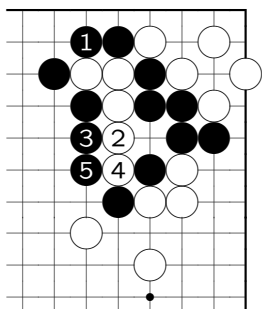


Problem 2

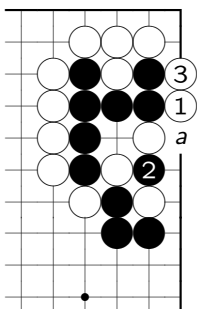


Problem 3

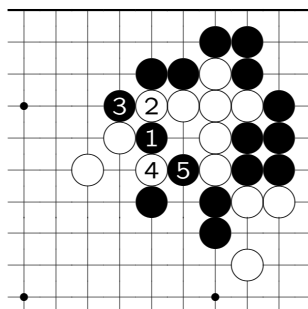
Problem 3. Black to play. White seems to have escaped, but...



Ans. to Prob. 1



Ans. to Prob. 2



Ans. to Prob. 3

Answer to problem 1. Black 1 and 3 are decisive.

Answer to problem 2. White 1 forces a snap-back. If Black plays 2 at 3, White can connect at *a*. If White played 1 at 3, Black *a* would win.

Answer to problem 3. Black 1 cuts White in two, and 5 completes the job.

The Throw-in Tesuji

Dia. 1. As usual, Black needs to find a way to capture the cutting stones. This position calls for a throw-in tesuji.

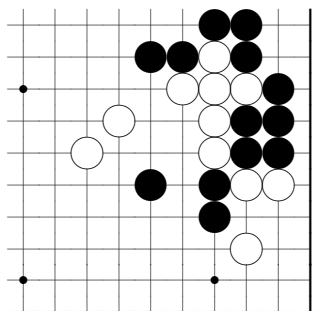
Dia. 2. Black 1 is the throw-in, a kind of sacrifice that deprives the enemy of essential liberties. White captures at 2, but...

The Squeeze Tesuji

Ladder-Building

The Placement Tesuji

More Problems



Problem 1

Chapter 4

Ko

Chapter 5

When Liberties Count