

Basics and object of the game

Backgammon is one of the oldest known board games. Its history can be traced back nearly 5,000 years to archaeological discoveries in Mesopotamia, modern day Iraq. It is a two-player game where each player has fifteen pieces (checkers or men) that move between twenty-four triangles (points) according to the roll of two dice. The objective of the game is to be first to bear off, i.e. move all fifteen checkers off the board. Backgammon is a member of the tables family, one of the oldest classes of board games.

Backgammon involves a combination of strategy and luck (from rolling dice). While the dice may determine the outcome of a single game, the better player will accumulate the better record over a series of many games. With each roll of the dice, players must choose from numerous options for moving their checkers and anticipate possible counter-moves by the opponent. The optional use of a doubling cube allows players to raise the stakes during the game.

Rules

The objective is for players to remove (bear off) all their checkers from the board before their opponent can do the same. As the playing time for each individual game is short, it is often played in matches where victory is awarded to the first player to reach a certain number of points.

Setup

Each side of the board has a track of 12 long triangles, called points. The points form a continuous track in the shape of a horseshoe, and are numbered from 1 to 24. In the most commonly used setup, each player begins with fifteen chips, two are placed on their 24-point, three on their 8-point, and five each on their 13-point and their 6-point. The two players move their chips in opposing directions, from the 24-point towards the 1-point.

Points 1 through 6 are called the home board or inner board, and points 7 through 12 are called the outer board. The 7-point is referred to as the bar point, and the 13-point as the midpoint. Usually the 5-point for each player is called the „golden point“.

Movement

To start the game, each player rolls one die, and the player with the higher number moves first using the numbers shown on both dice. If the players roll the same number, they must



roll again. Both dice must land completely flat on the right-hand side of the gameboard. The players then take alternate turns, rolling two dice at the beginning of each turn.

After rolling the dice, players must, if possible, move their checkers according to the number shown on each die. For example, if the player rolls a 6 and a 3 (denoted as „6-3“), the player must move one checker six points forward, and another or the same checker three points forward. The same checker may be moved twice, as long as the two moves can be made separately and legally: six and then three, or three and then six. If a player rolls two of the same number, called doubles, that player must play each die twice. For example, a roll of 5-5 allows the player to make four moves of five spaces each. On any roll, a player must move according to the numbers on both dice if it is at all possible to do so. If one or both numbers do not allow a legal move, the player forfeits that portion of the roll and the turn ends. If moves can be made according to either one die or the other, but not both, the higher number must be used. If one die is unable to be moved, but such a move is made possible by the moving of the other die, that move is compulsory.

In the course of a move, a checker may land on any point that is unoccupied or is occupied by one or more of the player's own checkers. It may also land on a point occupied by exactly one opposing checker, or „blot“. In this case, the blot has been „hit“ and is placed in the middle of the board on the bar that divides the two sides of the playing surface. A checker may never land on a point occupied by two or more opposing checkers; thus, no point is ever occupied by checkers from both players simultaneously. There is no limit to the number of checkers that can occupy a point at any given time.

Checkers placed on the bar must re-enter the game through the opponent's home board before any other move can be made. A roll of 1 allows the checker to enter on the 24-point (opponent's 1), a roll of 2 on the 23-point (opponent's 2), and so forth, up to a roll of 6 allowing entry on the 19-point (opponent's 6). Checkers may not enter on a point occupied by two or more opposing checkers. Checkers can enter on unoccupied points, or on points occupied by a single opposing checker; in the latter case, the single checker is hit and placed on the bar. More than one checker can be on the bar at a time. A player may not move any other checkers until all checkers on the bar belonging to that player have re-entered the board. If a player has checkers on the bar, but rolls a combination that does not allow any of those checkers to re-enter, the player does not move. If the opponent's home board is completely „closed“ (i.e. all six points are each occupied by two or more checkers), there is no roll that will allow a player to enter a checker from the bar, and that player stops rolling and playing until at least one point becomes open (occupied by one or zero checkers) due to the opponent's moves.

Bearing off

When all of a player's checkers are in that player's home board, that player may start removing them; this is called „bearing off“. A roll of 1 may be used to bear off a checker from the 1-point, a 2 from the 2-point, and so on. If all of a player's checkers are on points lower than the number showing on a particular die, the player must use that die to bear off one checker from the highest occupied point. For example, if a player rolls a 6 and a 5, but has no checkers on the 6-point and two on the 5-point, then the 6 and the 5 must be used to bear off the two checkers from the 5-point. When bearing off, a player may also move a lower die roll before the higher even if that means the full value of the higher die is not fully utilized. For example, if a player has exactly one checker remaining on the 6-point, and rolls a 6 and

a 1, the player may move the 6-point checker one place to the 5-point with the lower die roll of 1, and then bear that checker off the 5-point using the die roll of 6; this is sometimes useful tactically. As before, if there is a way to use all moves showing on the dice by moving checkers within the home board or by bearing them off, the player must do so. If a player's checker is hit while in the process of bearing off, that player may not bear off any others until it has been re-entered into the game and moved into the player's home board, according to the normal movement rules.

The first player to bear off all fifteen of their own checkers wins the game. If the opponent has not yet borne off any checkers when the game ends, the winner scores a gammon, which counts for double stakes. If the opponent has not yet borne off any checkers and has some on the bar or in the winner's home board, the winner scores a backgammon, which counts for triple stakes.

Doubling cube

To speed up match play and to provide an added dimension for strategy, a doubling cube is usually used. The doubling cube is not a die to be rolled, but rather a marker, with the numbers 2, 4, 8, 16, 32, and 64 inscribed on its sides to denote the current stake. At the start of each game, the doubling cube is placed on the midpoint of the bar with the number 64 showing; the cube is then said to be „centered, on 1“. When the cube is still centered, either player may start their turn by proposing that the game be played for twice the current stakes. Their opponent must either accept („take“) the doubled stakes or resign („drop“) the game immediately.

Whenever a player accepts doubled stakes, the cube is placed on their side of the board with the corresponding power of two facing upward, to indicate that the right to redouble, which is to offer to continue doubling the stakes, belongs exclusively to that player. If the opponent drops the doubled stakes, they lose the game at the current value of the doubling cube. For instance, if the cube showed the number 2 and a player wanted to redouble the stakes to put it at 4, the opponent choosing to drop the redouble would lose two, or twice the original stake.

There is no limit on the number of redoubles. Although 64 is the highest number depicted on the doubling cube, the stakes may rise to 128, 256, and so on. In money games, a player is often permitted to „beaver“ when offered the cube, doubling the value of the game again, while retaining possession of the cube.

A variant of the doubling cube „beaver“ is the „raccoon“. Players who doubled their opponent, seeing the opponent beaver the cube, may in turn then double the stakes once again („raccoon“) as part of that cube phase before any dice are rolled. The opponent retains the doubling cube. An example of a „raccoon“ is the following: White doubles Black to 2 points, Black accepts then beavers the cube to 4 points; White, confident of a win, raccoons the cube to 8 points, while Black retains the cube. Such a move adds greatly to the risk of having to face the doubling cube coming back at 8 times its original value when first doubling the opponent (offered at 2 points, counter offered at 16 points) should the luck of the dice change.

Some players may opt to invoke the „Murphy rule“ or the „automatic double rule“. If both opponents roll the same opening number, the doubling cube is incremented on each occasion yet remains in the middle of the board, available to either player. The Murphy rule may be invoked with a maximum number of automatic doubles allowed and that limit is agreed to prior to a game or match commencing. When a player decides to double the opponent, the

value is then a double of whatever face value is shown (e.g. if two automatic doubles have occurred putting the cube up to 4, the first in-game double will be for 8 points). The Murphy rule is not an official rule in backgammon and is rarely, if ever, seen in use at officially sanctioned tournaments.

The „Jacoby rule“, named after Oswald Jacoby, allows gammons and backgammons to count for their respective double and triple values only if the cube has already been offered and accepted. This encourages a player with a large lead to double, possibly ending the game, rather than to play it to conclusion hoping for a gammon or backgammon. The Jacoby rule is widely used in money play but is not used in match play.

The „Crawford rule“, named after John R. Crawford, is designed to make match play more equitable for the player in the lead. If a player is one point away from winning a match, that player's opponent will always want to double as early as possible in order to catch up. Whether the game is worth one point or two, the trailing player must win to continue the match. To balance the situation, the Crawford rule requires that when a player first reaches a score one point short of winning, neither player may use the doubling cube for the following game, called the „Crawford game“. After the Crawford game, normal use of the doubling cube resumes. The Crawford rule is routinely used in tournament match play. It is possible for a Crawford game to never occur in a match.

If the Crawford rule is in effect, then another option is the „Holland rule“, named after Tim Holland, which stipulates that after the Crawford game, a player cannot double until after at least two rolls have been played by each side. It was common in tournament play in the 1980s, but is now rarely used.

Variants

There are many variants of standard backgammon rules. Some are played primarily throughout one geographic region, and others add new tactical elements to the game. Variants commonly alter the starting position, restrict certain moves, or assign special value to certain dice rolls, but in some geographic regions even the rules and directions of the checkers' movement change, rendering the game fundamentally different.

Acey-deucey is a variant of backgammon in which players start with no checkers on the board, and must bear them on at the beginning of the game. The roll of 1-2 is given special consideration, allowing the player, after moving the 1 and the 2, to select any desired doubles move. A player also receives an extra turn after a roll of 1-2 or of doubles.

Hypergammon is a variant of backgammon in which players have only three checkers on the board, starting with one each on the 24, 23 and 22 points.

Nard is a traditional variant from Persia in which basic rules are almost the same except that even a single piece is „safe“. All 15 pieces start on the 24th wedge.

Nackgammon is a variant of backgammon invented by Nick „Nack“ Ballard in which players start with one less checker on the 6-point and midpoint and two checkers on the 23-point.

Russian backgammon is a variant described in 1895 as: „...much in vogue in Russia, Germany, and other parts of the Continent...“. Players start with no checkers on the board, and both players move in the same direction to bear off in a common home board. In this variant, doubles are more powerful: four moves are played as in standard backgammon, followed by four moves according to the difference of the dice value from 7, and then the player has

another turn (with the caveat that the turn ends if any portion of it cannot be completed).

Gul bara and **Tapa** are also variants of the game popular in southeastern Europe and Turkey. The play will iterate among Backgammon, Gul Bara, and Tapa until one of the players reaches a score of 7 or 5.

Coan ki is an ancient Chinese board game that is very similar.

Plakoto, **Fevga**, and **Portes** are three versions of backgammon played in Greece. Together, the three are referred to as Tavli.

Misere (backgammon to lose) is a variant of backgammon in which the objective is to lose the game.

Tavla is a Turkish variation.

Other minor variants to the standard game are common among casual players in certain regions. For instance, only allowing a maximum of five checkers on any point (Britain), or disallowing „hit-and-run“ in the home board (Middle East).

Strategy & tactics

Backgammon has an established opening theory, although it is less detailed than that of chess. The tree of positions expands rapidly because of the number of possible dice rolls and the moves available on each turn. Recent computer analysis has offered more insight on opening plays, but the midgame is reached quickly. After the opening, backgammon players frequently rely on some established general strategies, combining and switching among them to adapt to the changing conditions of a game.

A blot has the highest probability of being hit when it is 6 points away from an opponent's checker. Strategies can derive from that. The most direct one is simply to avoid being hit, trapped, or held in a stand-off. A „running game“ describes a strategy of moving as quickly as possible around the board, and is most successful when a player is already ahead in the race. When this fails, one may opt for a „holding game“, maintaining control of a point on one's opponent's side of the board, called an anchor. As the game progresses, this player may gain an advantage by hitting an opponent's blot from the anchor, or by rolling large doubles that allow the checkers to escape into a running game.

The „priming game“ involves building a wall of checkers, called a prime, covering a number of consecutive points. This obstructs opposing checkers that are behind the prime. A checker trapped behind a six-point prime cannot escape until the prime is broken. A particularly successful priming effort may lead to a „blitz“, which is a strategy of covering the entire home board as quickly as possible while keeping one's opponent on the bar. Because the opponent has difficulty re-entering from the bar or escaping, a player can quickly gain a running advantage and win the game, often with a gammon.

A „backgame“ is a strategy that involves holding two or more anchors in an opponent's home board while being substantially behind in the race. The anchors obstruct the opponent's checkers and create opportunities to hit them as they move home. The backgame is generally used only to salvage a game wherein a player is already significantly behind. Using a backgame as an initial strategy is usually unsuccessful.

„Duplication“ refers to the placement of checkers such that one's opponent needs the same dice rolls to achieve different goals. For example, players may position all of their blots in

such a way that the opponent must roll a 2 in order to hit any of them, reducing the probability of being hit more than once. „Diversification“ refers to a complementary tactic of placing one’s own checkers in such a way that more numbers are useful.

Many positions require a measurement of a player’s standing in the race, for example, in making a doubling cube decision, or in determining whether to run home and begin bearing off. The minimum total of pips needed to move a player’s checkers around and off the board is called the „pip count“. The difference between the two players’ pip counts is frequently used as a measure of the leader’s racing advantage. Players often use mental calculation techniques to determine pip counts in live play.

Backgammon is played in two principal variations, „money“ and „match“ play. Money play means that every point counts evenly and every game stands alone, whether money is actually being wagered or not. „Match“ play means that the players play until one side scores (or exceeds) a certain number of points. The format has a significant effect on strategy. In a match, the objective is not to win the maximum possible number of points, but rather to simply reach the score needed to win the match. For example, a player leading a 9-point match by a score of 7-5 would be very reluctant to turn the doubling cube, as their opponent could take and make a costless redouble to 4, placing the entire outcome of the match on the current game. Conversely, the trailing player would double very aggressively, particularly if they have chances to win a gammon in the current game. In money play, the theoretically correct checker play and cube action would never vary based on the score.