

## **MOMENTUM CHART**

Place one copy of this chart next to each player parallel to one side of the board.

### **SPEED**

The cross marked **SPEED** shows the speed of robots relative to the board - not the direction the robot is facing. The bar marked **SPIN** shows the degree that the robot is currently spinning each program phase. Put two markers on this table to show their momentum. When a robot moves onto the ice, move it normally, but update the chart to show the speed and direction with which it moved onto the ice.

### **SPIN**

Start with a marker on 0 spin. Each U-Turn moves the spin marker 1 space to the left or right (your choice) depending on the direction of rotation.

(As long as the robot proceeds cautiously without making hasty moves, the ice floor acts like a normal board. After that, if a robot starts a program phase on the ice, it moves as follows:

1. Add the actual program card with the movement on momentum table.
2. Move the robot on the resulting trajectory.
3. Subtract 1 from each direction on your momentum chart (friction) - down to 0.
4. If your program card is Move 2, Move 3 or U-Turn, increase the marker position accordingly.

### **COLLISIONS**

To determine if a moving robot collides with another robot, a pit, or a wall, draw a line between the centre of its starting square, and the square where it will end up. The robot moves through each square that the line does, in the same order. If the robot goes through a corner, it does not collide with anything in the neighboring squares.

- If a robot crosses a pit, it dies.
- If a robot hits a wall, it's speed is reduced to 0\*
- If a robot hits another robot, then (1) the moving robot stops dead in the square immediately before the square with the other robot in it, as if it had hit a wall and (2) the hit robot gains the points of speed that the moving robot lost+.

(\*Optional rule: the colliding robot takes one point of damage for each point of speed it lost or gained by collision. It keeps any spin it has.)

When a robot moves off the ice, it stops in the first non-ice space it reaches.

In addition, it stops spinning.



				4				
				3				
				2				
				1				
4	3	2	1	0	1	2	3	4
				1				
				2				
				3				
				4				

**MOMENTUM SPEED**

**MOMENTUM SPIN**

1	↻	↺	↶	○	↷	↻	↺	1
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