

Selecting a High Performance Ball

Fueling The Hook

When you release a bowling ball, you “fuel” the hook potential. Bowlers that spin the ball fast have a high “rev rate” (more full ball revolutions), and put a generous amount of fuel into the ball. Bowlers that spin the ball slowly have a low rev rate and put less fuel in the tank.



The Role of Friction

To understand ball reaction you need to understand the role friction plays on the lanes. Friction drains fuel from your ball. To hook a bowling ball and hit the pins with the appropriate amount of power, you still need some fuel in the tank when the ball hits the pocket. You must retain some energy.

In heavy oil, the ball slides and does not hook much. Hardly any fuel is drained because friction is low. In contrast, on a drier lane with light oil, the ball will hook tremendously, but fuel is drained very quickly because friction is higher. Friction creates hook, but also drains fuel from your ball.

The cover stock, or shell, of a bowling ball is designed to build friction to help you hook the ball. A bowling ball made for heavy oil, will be built with a cover stock that is designed to create a high amount of friction. In contrast, a ball for light oil will have a cover stock that creates lower amounts of friction.

So why not use a ball made for heavy oil on a light oil pattern? That ball should really hook, right?
WRONG! Remember, the key to striking is retaining some energy for hitting the pocket. A heavy oil ball is designed to build high levels of friction. A light oil pattern will also create high levels of friction. That means if you use a heavy oil hook monster on a light oil pattern, your fuel will be completely burned off before your ball hits the pins. What you will see is a ball that starts to hook, then gives up and rolls out. Using too strong of a ball on a lighter oil condition is a very common mistake.

Selecting the Right Ball for the Oil Condition

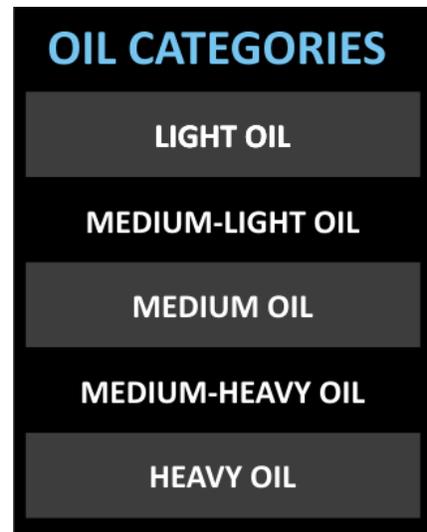
Of course, in order for you to select the correct ball, you need to know the oil pattern on which you are bowling. Most bowling centers apply what is known as a Typical House Shot (THS) for leagues and open play. While there are many variables that can affect how “oily” a shot is, in general, this Typical House Shot is considered to be “Medium Oil”.

At MOTIV bowling, we build balls for 5 categories of oil: Light, Light-Medium, Medium, Medium-Heavy, and Heavy oil (see the [MOTIV Ball Guide](#) online). Most often, bowlers will only encounter Medium-Heavy or Heavy oil patterns during tournament play, or in special leagues that apply “Sport” patterns to make the game more challenging.

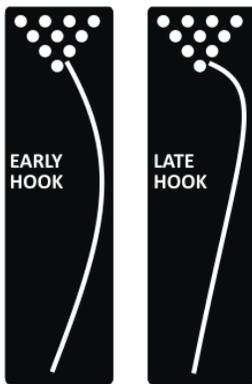
Typically, bowling centers will clean the lanes and apply fresh oil at least once each day. You should ask your bowling center when they apply oil and how often. This will help you better understand the condition. If your league is the first to bowl on this house shot, you could use a ball for Medium oil, like the MOTIV™ Sigma Tour. By the third game, as the pattern starts to wear down, you may want to shift to equipment for Light-Medium oil because you will begin to encounter more friction and burn more fuel. If you are on a league that bowls late in the evening, the oil pattern may be worn significantly at the start, so a ball built for Light-Medium oil may be the best option to begin with so you can retain some striking energy.

You do have some flexibility with these guidelines above since not all bowlers release a ball the same way. At MOTIV, we assume that you have medium revs and medium speed when we discuss ball reaction and the oil condition. For example, a bowler with low revs may actually want to use a Medium-Heavy oil ball like our Primal Scream™, or a Heavy oil ball like the 2Cruel™ when bowling on the typical house oil pattern because they need a little extra help hooking the ball.

The same is true of a bowler with high ball speed. Because their ball is traveling so fast down the lane, it is more difficult to create hook, so advancing to a ball built for more oil could help. However, it would not be advisable to advance more than 2 oil condition levels. For example, neither a rev-challenged nor a speed-dominant bowler would want to use a heavy oil ball like the 2Cruel™ on a light oil shot.



Do You Like Bananas or Hockey Sticks?



Another factor to consider is the type of ball motion you like. Some balls start to hook early and produce a smooth arcing motion down the lane - a banana shape. Other bowlers like to see the ball go very straight down the lane and hook late, making a more pronounced move at the backend of the lane. This is referred to as a hockey stick shape.

The motion of each bowling ball is determined by both the cover stock technology and the inner core design utilized. Inner cores have varying RG values, which determine how easy it is to rev a ball. The Differential value created by a core design influences Track Flare. Understanding how these variables impact the motion of your ball is very complicated. Therefore, to make it easy for you to find the motion you desire, we created the [MOTIV™ Ball Guide](#). It displays our equipment into 3 different categories: Early hook (banana), Delayed, and Late hook (hockey stick).

Closing Remarks

Our intention with this article is to provide you with a basic understanding of what to consider when choosing the ball you will purchase next. Of course, we want you to be 100% satisfied with your MOTIV™ equipment and that starts with getting the right gear in your hands. There are many other factors that contribute to ball motion and affect overall performance. Your local pro shop will also be able to help guide you to the equipment that is best for you. There is a chart at the end of this article that we would encourage you to bring to your local pro shop. It is a great reference that will point toward the current bowling equipment that is available from MOTIV™. Even if the pro shop does not currently stock every ball shown on this chart, they can order any item for you.

If you are looking for more helpful information from MOTIV, or details on the bowling equipment, please visit our website at www.motivbowling.com. We would also appreciate it if you would LIKE our [Facebook page](#) and join us on [Twitter](#). That way, you can stay engaged with other bowlers and get the latest news.

If watching ball motion videos would be helpful, please visit the [MOTIV YouTube Channel](#). As we introduce new balls, we will post video reviews to help you better understand the intention and capabilities of each release.

