



Jigsaw Innovations

by Clayton DeKorne



Two new jigsaws — the Porter-Cable 7649 (top) and the AEG BSPE 100 (center) offer useful features, but the old Bosch 1581 VS (bottom) is still preferred.

Two jigsaws — the Porter-Cable 7649 and the AEG BSPE 100 — offer features that no other jigsaw has and are worth checking out.

Porter-Cable has redesigned their old jigsaw with two key innovations: First, the blade is supported by two guide blocks that help hold the blade square to the base plate, and also act as a very successful anti-splintering device. Second, the new jigsaw will accept any style blade, whether it has a Porter-Cable "hook" shank, a Bosch-style "bayonet" shank, or the old universal shank.

AEG introduced the BPSE 100 a few years ago with a blade holder that stores the blade up in the shaft until you need it. This lets you use *all* of a four inch blade.

Attracted by these features, I brought the new Porter-Cable and AEG jigsaws into the shop to compare with my benchmark — the Bosch 1581VS, a tool that carpenters commend and toolmakers copy.

Benchmark Specs

On paper all the saws look pretty similar. They all have a 4.8-amp motor and a 1-inch stroke that moves at a variable rate between 500 and 3,100 strokes per minute. They all

have three orbital settings and an air blower for clearing chips out of the way. These features — all industry standards set by Bosch — are essential for jigsaws.

Orbital action, in particular, is a must. I used to think orbital action moved the blade side to side, making a rougher cut. Actually, the blade moves in line with the cut, backing off and plunging forward. This allows the blade to cool and clears chips from the kerf, so you're less likely to burn up blades. It's a more *aggressive* cut, but the cut is only noticeably rougher in laminates and delicate veneers. On an orbital setting, a jigsaw cuts curves easier and gives you better control, so your chances of making an accurate radius cut are higher. Most materials can be cut more efficiently on an orbital setting, except ceramic, thick metal, and very dense hardwood such as ebony. All three saws plunge cut easily on the highest orbital setting, as well.

Increasing Performance

With or without orbital action, jigsaws are still pretty rough saws. Just because they cut upwards and the cut is unsupported, you're going to get a less than perfect cut. This may be okay for cutting a hole for a rim setting sink, but if the sink is an under-mount type or you're scribing the countertop to the wall, chances are you'll need to finish your cut with a plane and belt sander. Until now, most folks remedy this by cutting from the back if possible. A lot of carpenters opt for a barrel-grip model that you can guide blind while you follow a line on the face. With practice this works well for a sink hole, but it won't get you far on the back-splash.

Another option toolmakers have offered is an anti-splintering device — a plastic insert that clips onto the base plate and supports the cut closely on both sides of the blade. These work well enough but they wear out or get lost easily. I prefer Porter-Cable's innovation that replaces these inserts, increasing the performance of the saw in more ways than one.

Porter-Cable built two metal guide blocks into the base plate that slide in and out just a tad, so you can push them up to various width blades for a well supported cut. The front of the blocks is flared slightly so that the blocks don't dull the set of the cutting teeth, and allows you to carefully follow a line. Yet the blocks hold down splinters. Even on oak and mahogany plywood, you get just a fine fuzzy line, instead of the usual long running tears.

But even more significant, the

guide blocks support the blade so it doesn't deflect too much when cutting tight curves. This feature is an improvement over Porter-Cable's former guide rollers. Bosch and AEG have a single roller in back of the blade with a groove in it to hold the blade on track. It's better than nothing, but the blade will still deflect, so your cut isn't square to the base plate. Porter-Cable seems to have licked the problem. The guide blocks hold the blade surprisingly straight, even cutting through 2x stock. But it's not foolproof; you still have to drive slow around turns when you want an accurate cut.

Porter-Cable has added a further innovation: a blade holder that will accept any style jigsaw blade. To convert between styles, you have to flip the clamp around. It's very easy. And though I never had much luck with universal shank blades since the holes weaken the shaft and they're always breaking, I've also been on jobs in strange cities where you're at the mercy of the stock in the local hardware store. I could've used Porter-Cable's new jigsaw then.

AEG only accepts the universal shank blades, but they have one

feature that almost makes up for it: the blades can slide up into the shaft, so you can adjust the depth of cut. The set screw clamps anywhere along the blade, so you can make use of the full-length of the cutting surface. Now I wish I had all those blades I threw away with only 1 inch burned up.

The Bottom Line

All three saws list for around \$250 each, and are available off the shelf for around \$150. After test driving all three saws, I ended up coming home to my Bosch. It doesn't have all the features (yet), but the other tools had some drawbacks. The base plate on the Porter-Cable is fixed, so you can't make bevel cuts. While you get a very stable and dead square base, you can't back-cut a scribe cut. And while you can bevel with the AEG (which, except for the blade adjusting feature, is a knockoff of the Bosch), I still found myself breaking the blades by the time I had extended them out to the very end. I might still have been coming out ahead on the cost of blades, but there's probably nothing more frustrating than a busted blade. ■

TOOLBITS

Got a lot of caulk or construction adhesive to lay down? A year ago I wrote about a pneumatic caulk gun I thought was a good answer, if only because it was a whole lot cheaper than AEG's cordless caulker. Now both these power caulker's have to contend with the *Drill-Mate Power Bead* (Aronie Concepts Inc., 27 Seymour St., Concord, MA 01742; 508/371-2292), a caulk gun that's powered by a 1/4-inch drill. Not only is the Power Bead less expensive than the pneumatic (\$30 retail for one that squirts 10 ounce tubes, \$36 for the quart-size), but with a cordless drill it can be cord free, too. I only had the chance to run out 4 tubes of caulk with it, but according to the manufacturer, a single charge on a 9.6-volt battery is enough to squeeze out about 25 tubes of caulk. It's fairly easy to lay down a smooth even bead (you want to use a variable speed drill for control). A large lever release on the drill attachment will "declutch" the drive train to keep the caulk from bleeding out. Granted, the price doesn't include the drill, but the conversion is quick and won't tie up a drill.

I've gotten good reports from the field about the *Arrow Cordless Electric Staple Gun* (Arrow Fastener Company Inc., 271 Mayhill St., Saddlebrook, NJ 07662; 201/843-6900). Several builders claim it's the tool of choice for installing batt insulation. The 7.2-volt stapler accepts regular T-50 staples and has a flush front so it fits into corners. One builder admitted his stapler had suffered numerous drops from the top of a ladder without so much as a jam.

Purple Belt is the name Porter-Cable has given to the new 3M sanding belts that have a special long-wearing abrasive. Both 3M and Porter-Cable claim the belts cut faster and leave a more uniform surface than conventional belts. I think that's a lot to expect from a belt, and is tough to test (the operator, after all, does have something to do with it). But in some short tests, I did notice the Purple Belts loaded up less frequently than the lumberyard brand I'd been using. Plus, the belts are joined with a "long-angle butt splice," so you can put them on the sander going any direction without searching for the arrow, and you don't get the maddening thump.

— C.D.