



Diesel Technology Tool List

Beloit Campus 2024-2025

Following are the required tools for the **Diesel Technology** program. These tools can be purchased from the vendor of your choice. All tools are to be of the finest quality. Tools will be inspected prior to being used in the department. The department reserves the right to refuse the use of worn or defective tools or tools which do not conform to the specifications of this list and the department chairperson.

Required Tools and Equipment

3/8" Drive:

3/8" 10 in & up Torque wrench

Ratchet Handle

Flex head Handle

3 Extensions (1.5 or 3, 4 or 6, 8 or 12 in.)

Spark Plug Sockets (5/8 & 13/16)

Universal Joint

3/8" SOCKETS

Std. 1/4 - 15/16 Shallow (12 Point)

Std. 1/4 - 15/16 Deep well (6 or 12 Point)

Metric Shallows 8 - 22 mm (6 or 12 Point)

Metric Deep well 8 - 22 mm (6 or 12 Point)

Impact Deep well Sockets 3/8 – 1" (12 Point)

Impact Metric Deep well Sockets 8 - 24 (12 Point)

3/8 Impact Gun (Pistol Grip)

3/8 Flex head Impact Sockets 3/8 – 3/4

3/8 Impact Extension 12 - inches

3/8 Torx Driver Set (T8 - T55 and 1/2" drive T60)

1/2" DRIVE

Ratchet

Breaker Bar

4 Extensions (2, 4, 8 & 10 in.)

Torque Wrench (25-250 ft. lbs.)

Universal Joint

1/2" SOCKETS

Std. 3/8 - 1 1/2 Shallows (12 Point)

Std. 7/16 - 1 1/4 Deepwell (6 Point)

Metric Shallow Set 12 - 32 mm (6 Point)

1/2" Dr. Deep well Chrome (10mm - 27mm)

Revised 4/15/24

WRENCHES

Polished Combination Wrench Set 1/4 - 1 1/4 Polished

Metric Combination Wrench Set 6mm - 24mm.

Flair Nut Wrench Set 3/8 - 7/8

Flair Nut Wrench Set Metric 6mm - 24mm

6" Adjustable Wrench

12" Adjustable Wrench

14" Pipe Wrench

Hex Key Wrench Set Std. 0.050" - 3/8"

Hex Key Wrench Set Metric 2mm - 12mm

PLIERS

7" Diagonal Pliers

10" Water Pump Pliers

6" Needle Nose Pliers

6" Slip Joint Pliers

Wire Pliers (Strippers-Crimpers)

Lock Ring Pliers

Combination Snap Ring Pliers

10" Curved Jaw Vise Grips

(Transmission Service Snap ring pliers

3/32" wide ends with a 1/8" dia. dimple for snap rings with tabs • Jaws are bent at a 90° angle • 14" long)

PUNCH & CHISELS

Pin Punch Set (3/32 - 3/8)

5 Piece Cold Chisel Set (1/4 - 3/4)

4 Piece Starting Punches (1/8 - 3/8)

6" Diamond Point Chisel

6" Cape Point Chisel

Aligning Punch Set

2 Center Punches

Brass Drift 3/4" x 10 or 12 in.

O-Ring Pick Set

CUTTING/ MATERIAL PREPING

Heavy Duty Scissors

High Tension Hack Saw

12" Flat File with Molded Handle

12" Round File with Molded Handle

12" Triangle File with Molded Handle

12" Half Round File with Molded Handle

1 1/2" A114 Single Heavy Blade Gasket Scraper

90 Degree Angle Head Die Grinder Set with Surface Prep Set
Inch and Metric Master Rethreading Set (Craftsman 0942275)

HAMMERS

4 oz. Ball Peen Hammer
16 oz. Ball peen Hammer
32 oz. Dead Blow Hammer
3 lb. Cross peen Hammer

SCREWDRIVERS & BARS

5 Piece Straight Blade Screwdriver Set
5 Piece Phillips Bit Screwdriver Set
20" Rolling Head Pry Bar
24" Pinch Bar, 3/4 Diameter, 22 or 24 in. long

MEASURING

26 Blade Bent Feeler Gauge Set
Deluxe Feeler Gauge Set
25' Tape Measure
0" - 6" Dial Caliper
0"-1" Micrometer
Snap Gauge set 5/16"-6"
Dual Foot Tire Pressure Gauge
Tire Depth Gauge
Machinist Ruler

ELECTRICAL TESTING

Battery Service Kit (Battery Pliers, Terminal Puller, Side Post Cleaner, Clamp Spreader)

SAFETY

Safety Glasses and Goggles
Hearing Protection

GENERAL/SPECIALTY

Magnetic Pick Up Tool
OSHA Approved Rubber Tip Blow Gun
Telescoping 2 1/2" Diameter Mirror
Dual Foot Air Chuck
Mini Bright Light
Fractional Drill Bit Set by 64/th. To 1/2 inch. (High Speed Steel)
Hand Held Trouble light
Shoe Style Wire Brush

AIR CONDITIONING TOOLS

Manifold Gauge Set 134A
A/C Wrench
Thermometer Probe
1/4" Dr.
Ratchet
Universal Joint
2" & 4" Extensions
Std. Shallow 6 pt. 3/16 - 9/16
Std. Deep well 6 pt. 3/16 - 9/16
Metric Shallow 6pt. 4mm - 13mm
Metric Deep well 6pt 4mm - 13mm

Miscellaneous

Roll Pin Punch Set
Bearing Punch
6" Rolling Head Pry Bar
Seal Puller
4 Piece Pry Bar Set
3/8" Dr. Torque Wrench
3/8" Dr. Hex Socket Set (1/8" - 3/8")
3/8" Dr. Impact Driver Set
Adapter Set 6 Piece
3/4" Heavy Duty Drive Set (1 1/4, 1 5/16, 1 5/8, 1 7/16, 1 1/2)
4000# Lifting Eyes
16" Adjustable Joint Pliers
1/2" Air Impact (Pistol Grip)
48 oz. Hand Drilling Hammer
Engraver

Students must purchase a Top Chest and Roll Cab large enough to hold all the listed tools Estimated Cost: Please see Vendor Quotes for total cost estimates.

Note: Estimated costs reflect current market value and are subject to change.

Vendor Information:

Tools may be purchased from MATCO, MAC, Snap-On Tools, Wilde or the supplier of student choice. Please contact the Department Chair with questions or for further information.

