## Specialty Tools

## LEFT-HAND SPIRAL JOBBER LENGTH, LEFT-HAND VORTEX-POINTT

Type 190-AL Magnum Super Premium - Left Hand Spiral

- Special Hi-Molybdenum tool steel.
- $135^{\circ}$ split point for fast penetration and accurate starting without center punch.
- Precision ground point, flutes, body, clearance and drill diameter for the ultimate in accuracy and performance.
- Ideal for removing broken studs.

| Part \# | Diameter <br> Inches | OAL <br> Inches | Flute Length <br> Inches | Qty. <br> per/pack |
| :--- | :---: | :---: | :---: | :---: |
| 92430 | $1 / 16^{\prime \prime}$ | $1-7 / 8$ | $7 / 8$ | 6 |
| 23150 | $5 / 64$ | 2 " | $1^{\prime \prime}$ | 6 |
| 89290 | $3 / 32^{\prime \prime}$ | $2-1 / 4$ | $1-1 / 4$ | 6 |
| 23160 | $7 / 64$ | $2-5 / 8$ | $1-1 / 2$ | 6 |
| 92440 | $1 / 8^{\prime \prime}$ | $2-3 / 4$ | $1-5 / 8$ | 6 |
| 92441 | $9 / 64$ | $2-7 / 8$ | $1-3 / 4$ | 6 |
| 23170 | $5 / 32^{\prime \prime}$ | $3-1 / 8$ | $2{ }^{\prime \prime}$ | 6 |
| 92442 | $11 / 64$ | $3-1 / 4$ | $2-1 / 8$ | 6 |
| 92450 | $3 / 16^{\prime \prime}$ | $3-1 / 2$ | $2-5 / 16$ | 6 |
| 92443 | $13 / 64$ | $3-5 / 8$ | $2-7 / 16$ | 6 |
| 92444 | $7 / 32$ " | $3-3 / 4$ | $2-1 / 2$ | 6 |
| 92451 | $15 / 64$ | $3-7 / 8$ | $2-5 / 8$ | 6 |
| 92460 | $1 / 4^{\prime \prime}$ | $4{ }^{\prime \prime}$ | $2-3 / 4$ | 6 |
| 92452 | $17 / 64$ | $4-1 / 8$ | $2-7 / 8$ | 6 |
| 92453 | $9 / 32^{\prime \prime}$ | $4-1 / 4$ | $2-15 / 16$ | 6 |
| 23180 | $19 / 64$ | $4-3 / 8$ | $3-1 / 16$ | 3 |
| 92470 | $5 / 16^{\prime \prime}$ | $4-1 / 2$ | $3-3 / 16$ | 3 |
| 92471 | $21 / 64$ | $4-5 / 8$ | $3-5 / 16$ | 3 |
| 92472 | $11 / 32^{\prime \prime}$ | $4-3 / 4$ | $3-7 / 16$ | 3 |
| 92473 | $23 / 64$ | $4-7 / 8$ | $3-1 / 2$ | 3 |
| 92480 | $3 / 8^{\prime \prime}$ | $5 "$ | $3-5 / 8$ | 3 |
| 92481 | $25 / 64$ | $5-1 / 8$ | $3-3 / 4$ | 3 |
| 92482 | $13 / 32^{\prime \prime}$ | $5-1 / 4$ | $3-7 / 8$ | 3 |
| 92483 | $27 / 64$ | $5-3 / 8$ | $3-15 / 16$ | 3 |
| 92490 | $7 / 16^{\prime \prime}$ | $5-1 / 2$ | $4-1 / 16$ | 3 |
| 92491 | $29 / 64$ | $5-5 / 8$ | $4-3 / 16$ | 3 |
| 92492 | $15 / 32^{\prime \prime}$ | $5-3 / 4$ | $4-5 / 16$ | 3 |
| 92493 | $31 / 64$ | $5-7 / 8$ | $4-3 / 8$ | 3 |
| 92500 | $1 / 2^{\prime \prime}$ | $6 "$ | $4-1 / 2^{\prime \prime}$ | 3 |

## Type 175-UTL

## Left-Hand VORTEX-point \& Spiral Hi-Carbon

Screw Pipe Extractor

- Unique tip geometry reduces heat generation \& cutting tool wear increasing tool life.
- Remove broken screws, bolts threaded parts, and pipes.

| Part \# | Diameter <br> Inches | OAL <br> Inches | Flute Length <br> Inches |
| :--- | :---: | :---: | :---: |
| 35582 | $1 / 8^{\prime \prime}$ | $2-1 / 2^{\prime \prime}$ | $1-7 / 16^{\prime \prime}$ |
| 35622 | $3 / 16^{\prime \prime}$ | $3^{\prime \prime}$ | $2-7 / 8^{\prime \prime}$ |
| 35662 | $1 / 4^{\prime \prime}$ | $3-1 / 2^{\prime \prime}$ | $2^{\prime \prime}$ |
| 35702 | $5 / 16^{\prime \prime}$ | $4 \prime$ | $2-1 / 2^{\prime \prime}$ |
| 35742 | $3 / 8^{\prime \prime}$ | $4-1 / 4^{\prime \prime}$ | $2-11 / 6^{\prime \prime}$ |


| TYPE 420 \& VORTEX-POINT ${ }^{\text {TM }}$ SET |  |  |  |
| :---: | :---: | :---: | :---: |
| LEFT-HAND VORTEX-pont \& SPIRAL EXTRACTOR |  |  |  |
| Part \# |  | Description of Sizes | Qty of each |
| 35852 | BR-10VT | $\begin{gathered} \hline \text { EX } 1,2,3,4,5+1 / 8^{\prime \prime}, 3 / 16^{\prime \prime} \\ 1 / 4^{\prime \prime}, 5 / 16^{\prime \prime}, 3 / 8^{\prime \prime} \end{gathered}$ | 1 |

## Broken Bolt Remover Combo Type 420-AL

- Carded left hand drill combined with spiral style screw extractor is ideal for removing broken studs.
$\left.\begin{array}{l}\text { Part \# } \begin{array}{cccc}\text { Screw Extractor } \\ \text { Number }\end{array}\end{array} \begin{array}{c}\text { Description } \\ \text { of Sizes }\end{array} \quad \begin{array}{c}\text { Qty } \\ \text { of each }\end{array}\right\}$

| TYPE 190-AL LEFT-HAND SPIRAL SETS |  |  |  |
| :---: | :---: | :---: | :---: |
| Part \# |  | 8 PC, Description of Sizes | Qty of each |
| 87650 | LF-8 | 1/16-1/2" by 16ths | 1 |
| Part \# |  | $12 \text { Pc. }$ <br> Description of Sizes | Qty of each |
| 87651 | LF-12 | 1/16-5/16" by 32nds, 3/8, 7/16 \& 1/2" | " |
| Part \# |  | $13 \text { Pc. }$ <br> Description of Sizes | Qty of each |
| 87652 | LF-13 | 1/16-1/4" by 64 ths | 1 |
| Part \# |  | $15 \text { Pc. }$ <br> Description of Sizes | Qty of each |
| 87654 | LF-15 | 1/16-1/2" by 32nds | 1 |
| Part \# |  | 17 Pc. <br> Description of Sizes | Qty of each |
| 87853 | LF-17 | 1/16-1/4" by 64 ths, $5 / 16-1 / 2^{\prime \prime}$ by 16 ths | hs |
| Part \# |  | $29 \text { Pc. }$ <br> Description of Sizes | Qty of each |
| 87854 | LF-29 | 1/16-1/2" by 64ths | 1 |
| Part \# |  | 29 Pc.- Ultra Dex <br> Description of Sizes | Qty of each | 87859 LF-29P 1/16-1/2" by 64ths

Left-Hand Screw Machine Length
$135^{\circ}$ Split Point, 3 -Flats on Shank 3/16" \& Larger

## Type 135-Al. Black \& Gold

- Ideal for removing broken studs in tight areas.
- Left hand spiral drills often remove bolt without the need for an extractor.


| TYPE 421-USA SET |  |  |  |
| :---: | :---: | :---: | :---: |
| Part \# |  | SQUARE EXTRACTOR Description of Sizes | Qty of each |
| 35484 | BR-10SQ | $\begin{gathered} \hline \text { E } 1,2,3,4,5+3 / 32^{\prime \prime}, 1 / 8^{\prime \prime} \\ 3 / 16^{\prime \prime}, 1 / 4^{\prime \prime}, 5 / 16^{\prime \prime} \end{gathered}$ | 1 |
| 35491 | BR-10SQX | $\begin{gathered} \mathrm{E} 1,2,3,4,5+1 / 8^{\prime \prime} \\ 3 / 16^{\prime \prime}, 1 / 4^{\prime \prime}, 5 / 16^{\prime \prime}, 3 / 8^{\prime \prime} \end{gathered}$ | 1 |

