



Igneous HAMMR Jars

Deliver hundreds of hits without loss in
performance

Downhole. Workover. Rentals.

Igneous HAMMR Jars

- 🌀 Introduction to tool
- 🌀 Features
- 🌀 Benefits
- 🌀 Specs
- 🌀 Contact Information
- 🌀 WOS Overview & Locations



IH Jars Overview

- The Workover Solutions Igneous HAMMR Jars can be used for fishing, workover and frac plug milling operations on both coiled tubing and stick pipe operations.
- The WOS Jars are robust, dependable; provide a high jarring impact while maintaining a short overall length.
- They are conventionally run as bidirectional hydraulic jars but can easily be converted to be unidirectional jars, for fishing operations, or as bumper jars.
- The WOS Jars are unique since they can be pinned in the closed position prior to operations. In doing so this eliminates some of the internal seal failures associated with jars being run on milling operations with extended reach tools.
- The result is a jar that is ready to fire at all phases of the operation.



Features

- ⦿ Can be ran in operations needing bidirectional, unidirectional or bumper jars
- ⦿ Proven reliable design for milling operations with hard hitting extended reach tools
- ⦿ Stroke length and jarring ability similar to competitors with reduced overall length
- ⦿ Patented variable shear screw design
- ⦿ Built in flex sub



Benefits

- ④ Locked to prevent premature activation while running in hole
- ④ Reduced overall length without loss in performance
- ④ Field proven to deliver hundreds of hits over multiple days without a loss in performance
- ④ Ready to fire during all phases of the operation eliminating cycle time
- ④ Flexibility in direction allows for jar to be utilized in any operation



IH Jar Specs

IH Jar Specs							
Tool Size, in	1.7	2.375	2.875	3.125	3.5	3.75	6.25
Max OD, in	1.7	2.375	2.875	3.125	3.5	3.75	6.25
Min ID, in	0.54	0.75	1	1	1.12	1.88	2.25
Shoulder to Shoulder Length, in	51.15	68.7	62.5	66.5	74.13	76.8	269.5
Stroke Length, in	12	12	10.8	12.8	12	12	24
Torsional Yield, ft-lbs	725	2,700	3,200	4,875	8,600	12,100	44,500
Top Connection	1 MT Box	1-1/2 MT Box	2-3/8 PAC Box	2-3/8 REG Box	2-3/8 REG Box	2-7/8 AOH Box	4-1/2 IF Box
Bottom Connection	1 MT Pin	1-1/2 MT Pin	2-3/8 PAC Pin	2-3/8 REG Pin	2-3/8 REG Pin	2-7/8 AOH Pin	4-1/2 IF Pin
Tensile Yield, lb-f	61,600	97,000	167,000	222,000	300,000	240,000	1,000,000

Contact Information

To secure the highest quality of tools engineered, manufactured and tested in the USA contact your local WOS representative or contacts below

Main phone - 346-774-4433

Email - sales@wos.com

WOS Company Overview

- 🌀 Started Operations in Q3 2015
- 🌀 Fully Supported Downhole Tool Division
 - Design & Engineering
 - Machining & Fabrication
 - Field Operations
 - Rebuild & Redress
 - Evaluate Performance
- 🌀 Wireline
 - 4 trucks in the Northeast and 2 in West Texas
 - Started operations in July 2018
- 🌀 Operational Coverage
 - Pennsylvania, Ohio, West Virginia, and New York
 - Texas, New Mexico
 - North Dakota, Wyoming
 - Louisiana



WOS Locations

