

**PLAY 30X7 | P/N 81401193**

Magswitch LAY series utilizes field interaction between individual magnets to increase depth of field and spread the attractive force over a larger footprint. This allows for greater working loads and increased control over larger work pieces. With customizable pole shoes to fit almost any application, the LAY is a great all around tool that is perfect for picking pipe and round as well as large plate steel.

**WARNING!**  
**Do Not Operate Unless In Contact With Ferrous Target**

## Specifications

Nominal Maximum Breakaway Force <sup>1,2</sup>	782.6 lb	355 Kg
Nominal Maximum Shear Force <sup>1,2</sup>	215.3 lb	97.67 Kg
Thickness for De-Stack <sup>3</sup>	0.187 in	4.76 mm
Minimum Actuation Pressure	26.11 psi	1.8 Bar
Maximum Actuation Pressure	116.03 psi	8 Bar
Off-Target Actuation Pressure	60.92 psi	4.2 Bar
Air Port Threads	2x M5x0.8	
Net Weight	10.6 lb	4.8 Kg
Individual Magnetic Pole Footprint	10.16"x1.6"	258mm x 41mm
Mounting Options	4x Side: Ø5-M5-Ø5 2x Top: Ø8-M8-Ø8	



Material Thickness - mm (in)	0.60 (0.024)	0.80 (0.031)	1.20 (0.047)	3.00 (0.118)	4.76 (0.187)	6.35 (0.250)	9.50 (0.374)	12.70 (0.500)	50.80 (2.000)
Maximum Force <sup>1,2,5</sup> - kg (lbs)	30.57 (67.39)	31.50 (69.45)	59.20 (130.51)	177.27 (390.81)	210.10 (463.19)	252.07 (555.71)	307.30 (677.48)	355.00 (782.64)	354.57 (781.69)
Required Air Pressure <sup>4</sup> - bar (psi)	3.60 (52)	3.20 (46)	2.80 (41)	1.80 (26)	1.80 (26)	1.80 (26)	1.80 (26)	1.80 (26)	1.80 (26)

<sup>1</sup> Determined in laboratory environment on 2" thick SAE1018 Steel with surface roughness 63 micro inches with optimized pole shoes. Many factors contribute to the actual breakaway force and safe working load in each application. Consult a Magswitch Applications Engineer and test the Magswitch in each application before deployment.

<sup>2</sup> All data applies to unit with flat pole shoes installed.

<sup>3</sup> Determined with SAE1018 Steel L=200mm W=200mm.

<sup>4</sup> Values may vary by +/- 5%.

<sup>5</sup> Maximum forces listed above are not safe lifting forces. Designer must take into account safety factor when specifying tool. Magswitch recommends SWL = 5:1 for most applications.

$$SWL \text{ (Safe Working Load)} = \frac{\text{Maximum Force}^5}{\text{Safety Factor} (\geq 5)}$$

### Pole shoes required for operation

#### Standard Kits Available:

PLAY30X7 Standard Pole Shoe Kit	8800739
PLAY30X7 2mm Comb/Tooth Pole Shoe Kit	8800748
PLAY30X7 Prox Cap Kit	8800758

