

YOUR DRILLING EXPERT



PRODUCT CATALOGUE

Contents



Our commitment to you

At Halco we pride ourselves on providing exemplary levels of customer service, support and training no matter what your drilling requirements are.

Having manufactured drilling consumables for over seventy years, our support team are well placed to provide accurate and timely solutions to optimise your drilling performance.

Halco is a world class manufacturer of Down The Hole (DTH) drilling equipment with manufacturing locations in The United Kingdom and Australia . Our headquarters are in the North of England, where Halco pioneered the development and distribution of DTH hammers and bits in the 1950's

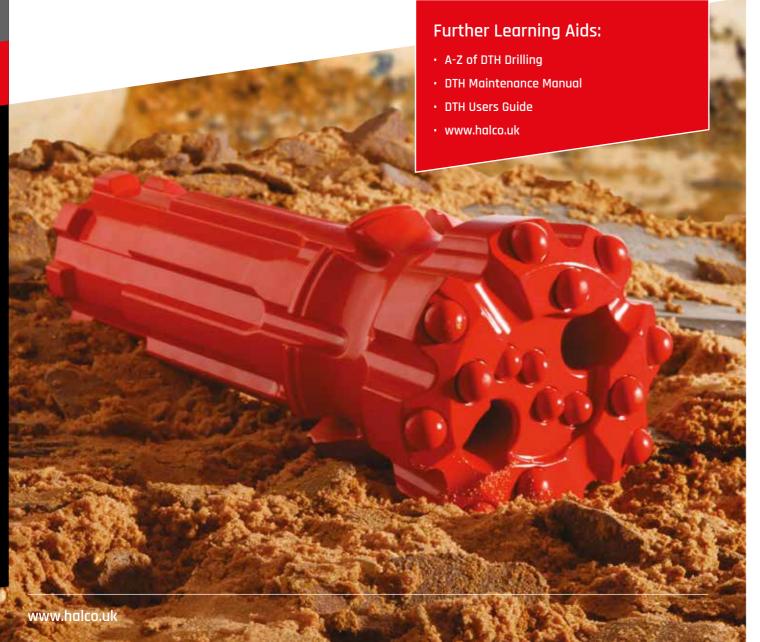
Produced for more than seventy years, our products continue to be regarded as some of the most reliable and durable available today. This is due to our commitment to meet our customers needs, design expertise, and rigorous product testing in extreme drilling conditions.

We offer a wide range of specialist products necessary for the rigours of every drilling application.

- Mining
- Quarrying
- · Oil and Gas
- Exploration
- Waterwell
- · Geotechnical/Civil Engineering

Our team of specialists, together our dedicated dealer network are available to help you select the optimal product for your drilling application and equipment.

To find you nearest Halco dealer contact our sales teams at one of our sales locations shown on the back page of this document.



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Hammer Selection Guide

Choosing the right hammer is essential to your productivity and operating cost.

All Halco hammers are built to last and manufactured to an exceptional standard. Our hammers provide the outstanding performance and productivity expected by drillers worldwide.

Versatility and variety are key to Halco products and you can be assured that all Halco hammers are suitable for a wide range of rock drilling applications.

All our high performance hammers are built at our state-of-the-art lean manufacturing plant using the highest quality heat treated nickel chrome alloy steels and processes that meet ISO 9001:2008 standards. It is imperative to Halco that every hammer we produce surpasses your expectations and we constantly strive to improve our service and product quality.



Our hammer range includes:

Superior Range

Halco's Superior range are the obvious choice for the Oil & Gas industry where both maximum speed and reliability are expected.

Standard features of the Superior range include diamond enhanced drill bits and a bit catcher system. Variable bypass ports have been added to the top adaptor as well as live air bleed pistons. Together these features give the driller the ability to inject greater volumes of air and drilling additives to increase the uphole velocity required to drill deeper holes.

RC Range

The Halco reverse circulation (RC) product range has been designed to give maximum performance in Exploration and Grade Control applications.

Unlike standard DTH hammers, RC hammers return the rock cuttings back to the surface through the internals of the hammer and drill string.

Geologists worldwide trust Halco RC products to help them explore prospects and identify mineral lithologies.

Dominator Range.

The Dominator range of hammers offer higher performance and are ideally suited for medium to higher air pressures in blast-hole applications.

This design is simple with fewer components, which makes servicing and on-site maintenance easy. With a range of heavy duty models on offer this extends the life of the hammer considerably.

Mach Range

This is a proven hammer which has been around for over 35 years. Designed for all kinds of drilling conditions but excels in overburden drilling due to the high frequency with less blow energy, particularly in unstable ground conditions. This hammer can drill smaller diameters than the standard range and is ideal for civil engineering applications.

GP Range

The GP series offers breakthrough performance across some of the most challenging applications. The robust non ported piston design dramatically improves drilling performance when operating under a column of water.

A built-in choke facility allows the driller to adjust the volume of air through the hammer to optimise cutting evacuation.



1" Dominator 10

DOMINATOR 10

One piece top adaptor reduces

internal parts. No makeup required. —•

Revised chamber volumes and cycle ____o timing to optimize performance.

Simplified piston geometry for improved balance and location

within cylinder

External N.R.V. for easy maintenance.

The Dominator 10 is designed for small diameter drilling operations.

The Dominator 10 provides high performance at both low and high pressures. The strong robust design withstands heavy duty applications and includes an N.R.V (Non Return Valve) which is fitted into the hammer to prevent flooding where ground water is present.



Hammer Overview	
Hammer Model	Dominator 10
Part Number	600422
Shank	Halco 1
Thread connection	40mm DIN 405 6 TPI Box
Minimum bit diameter	55 MM
Hammer flat size	38mm (1.5")
Weight	7.0 Kg (15.4 lbs)
Outside diameter	47mm (1 7/8")
Length (shoulder to shoulder)	772mm (30.9")
Maximum weight on bit	120 Kg (264 lbs)

	Parts List				
)	Hammer type	Dominator 10			
	Shank	Halco 1			
	Part number	600422		Service Kit	Repair Kit
	Item	Description	Part No.	SK31	RK54
) _	1	Thread Protector	200005		
	2	Snap Ring	783041	1	
	3	Non Return Valve Seat	603448		
	4	O-Ring	768174	1	
	5	Non Return Valve	603447		
	6	N.R.V. Spring	760100	1	
	7	Top Adaptor	603413		
١	8	O-Ring	768168	1	
,	9	O-Ring	768175	1	
	10	Cylinder	603410		
	11	Piston	603450		
	12	Snap Ring	783037	1	
	13	Bit Retaining Ring	603449		
	14	Chuck Spacer	603412	1	
	15	Chuck	603411		

350					
300	-	-		-	
250	-				
200	-				
150			•		
100	-			-	
100					
50					
	150	200	250	300	350

Air Consumption

AT A GLANCE:







Halco 2 2 3/4 - 3"

(7 - 17 bar)

Hammer Overview	
Hammer Model	Mach 20
Part Number	600169
Shank	Halco 2
Thread connection	50mm DIN405 6 TPI Box
Minimum bit diameter	70 MM
Hammer flat size	48mm (1.89")
Weight	13.0 Kg (28.6 lbs)
Outside diameter	62mm (2.44")
Length (shoulder to shoulder)	840mm (33.0")
Maximum weight on bit	150 Kg (330 lbs)

Hammer type	Mach 20			enance
Shank	Halco 2			
Part number	600423		Service Kit	Repai Kit
Item	Description	Part No.	SK18	SK30
1	Thread Protector	200002		
2	Top Adaptor	602715		
3	Wear-Space (Option)	602726	1	
4	Non Return Valve	602727		
5	N.R.V. Spring	760111	1	
6	N.R.V. Housing	602720		
7	Valve Centraliser	602724	1	
8	Valve	602725	1	
9	Solid bleed plug -Std	732025	1	
	3mm Bleed Plug	602736	1	
10	Air Distributor	602719		
11	Liner	602717		
12	Cylinder	602714		
13	Piston	602718		
14	Piston Guide Bush	602723		
15	Bottom Spacer	602722		
16	Bit Retaining Ring	602721		
17	Chuck Lock Ring	602729	1	
18	Chuck	602716		

Air Consumption 400 350 300 250 E 200 150 100 100 150 200 250

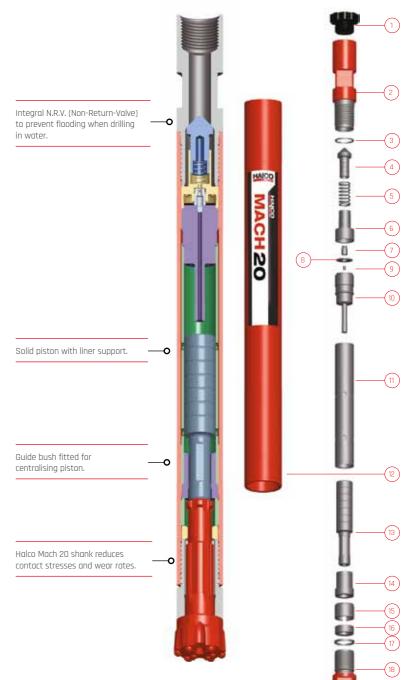
MACH 20

The valved design of the Mach 20 provides high performance at low pressure. A non return valve is fitted to prevent flooding when Hammers

2" Mach 20

The Mach 20 has a strong robust design to withstand heavy duty applications. The Mach 20 is fitted with adjustable chokes to give three levels of air volumes for different drilling conditions. The unique drill bit design for Mach 20 does not use foot valve which reduces the possibility of hammer failure. Mach 20 shank has a long service life and reduces contact stresses and wear rates.

Suitable for operation at air pressures of 100 - 250 psi (7 - 17 bar). Drilling diameters of 70 - 76mm (2 3/4 - 3").



HAICO

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The Halco shank reduces contact stress and wear rates.

Hammers

3" GP300

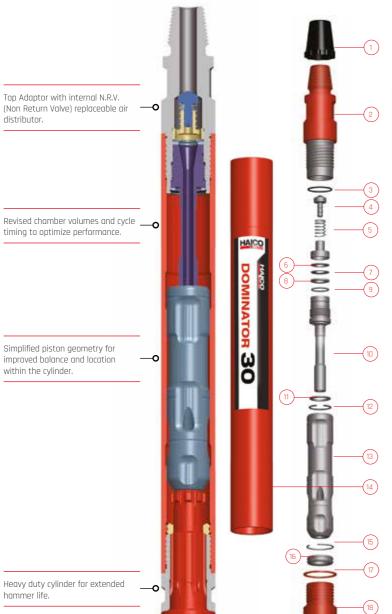
3" Dominator 30

DOMINATOR 30

The Dominator 30 hammer is a high performance hammer for medium to hard rock conditions.

This hammer has no internal liner which allows a larger piston diameter for greater blow energy.

The Dominator 30 has fewer parts than other 3 inch hammers in the market, which allows for easy maintenance and servicing.



AT A GLANCE: SIZE SHANK **AIR PRESSURE** 90mm - 105mm I.R.3.5 100 - 362 psi 3 1/2 - 4 1/8" (7 - 25 bar)

Hammer Overview	
Hammer Model	Dominator 30
Part Number	600424
Shank	IR3.5
Thread connection	2 3/8" API Reg Pin Up
Minimum bit diameter	90 MM
Hammer flat size	63mm (2.48")
Weight	23Kg (83.8 lbs)
Outside diameter	81mm (3.35")
Length (shoulder to shoulder)	832mm (32.25")
Minimum weight on bit	150 Kg (330lbs)
Maximum weight on bit	300 Kg (660lbs)

Hammer type	Dominator 30			
Shank	IR3.5			
Part number	600424		Service Kit	Repo Kit
Item	Description	Part No.	SK27	RK4
1	Thread Protector	200111		
2	Top Adaptor	602980		
3	0-Ring	768098	1	
4	Non Return Valve	602328		
5	N.R.V. Spring	760100	1	
6	N.R.V. Housing	602971		
7	Disk Springs	760094	1	
8	Thrust Washer	602972		
9	O-Ring	768033	1	
10	Air Distributor	603108		
11	Washer	602979		
12	Snap Ring	783035	1	
13	Piston	603107		
14	Cylinder	602974		
15	Spacer	783036	1	
16	Bit Retaining Ring	602976		
17	Chuck Spacer	602977	1	
18	Chuck	602978		
	Foot Valve	602922		

Air Co	onsumption
700	
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300	
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1	00 150 200 250 300 350 400 450 500
	PSI

Figures are based on theoretical data

AT A GLANCE:

SIZE



MD3.5

AIR PRESSURE 100 - 362 psi

95mm - 105mm 3 1/2 - 4 1/8"

(7 - 25 bar)

Hammer Overview	
Hammer Model	GP300
Part Number	600393
Shank	MD3.5
Thread connection	2 3/8" API Reg Pin Up
Minimum bit diameter	95 MM
Hammer flat size	64mm (2.520")
Weight	24 Kg (52.91 lbs)
Outside diameter	85mm (3.35")
Length (shoulder to shoulder)	885mm (34.84")
Minimum weight on bit	150 Kg (330lbs)
Maximum weight on bit	300 Kg (660lbs)

Hammer type	GP300			
•			Mainte Ki	
Shank	MD3.5		Service	Repa
Part number	600393		Kit	Kit
Item	Description	Part No.	SK64	RK10
1	Thread Protector	200111		
2	Top Adaptor	604371		
3	Choke - Blank	604480	1	
	Choke - 1/8"	604481	1	
	Choke - 3/16"	604482	1	
4	Non Return Valve	604378	1	
5	N.R.V. Spring	760154		
6	Make up Shim - 4.9mm	602634		
	Make up Shim - 5.3mm	602635		
	Make up Shim - 5.7mm	602636		
7	Compression Spring	760107		
8	Air Distributor	604461		
9	O-Ring	768099	1	
10	Liner	604459		
11	Cylinder	604458		
12	Piston	604460		
13	Snap Ring	783051	1	
14	Retaining Ring band	792040	1	
15	Bit Retaining Ring	604457		
16	Chuck	604456		

*Alternative 600394 IR3.5 Shank

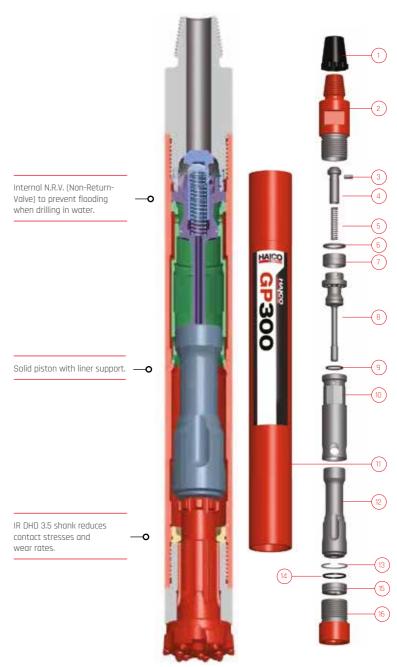
Air Consumption

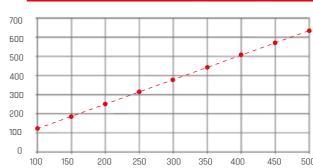
700 600 500 400 300 200

GP300

Dominator 375 hammer gives up to 25% increase in performance compared to Dominator 350 and Dart 350.

This exceptional hammer is simple, robust and has a high penetration rate. The Dominator 375 has an integral N.R.V. (Non-Return-Valve) with an adjustable air bleed system to adjust air volume, this hammer has a liner and solid piston design. This hammer has few internal parts which makes on site servicing easy with minimum tools needed. The MD 3.5 shank drill bit can be fitted for improved service life and heavy duty applications. Suitable for operation at air pressures of 100 - 350 psi (7 - 24 bar). Drilling diameters of 95mm - 115mm (3 1/2 - 4 1/8").





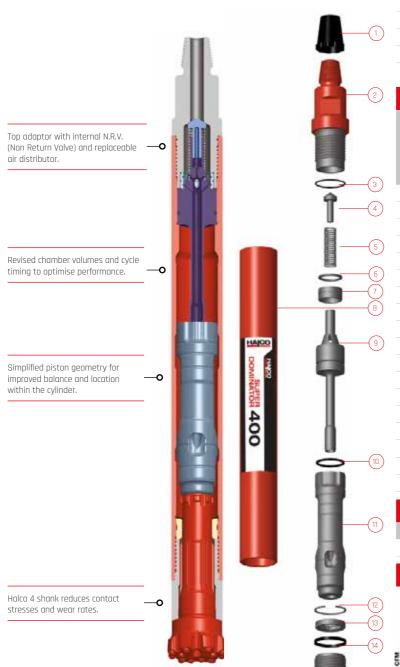


4" Super Dominator 400

SUPER DOMINATOR 400

The Super Dominator 400 is a heavy duty hammer with thicker 98mm (3.8") diameter outer components to provide extra service life in abrasive conditions and is suitable for waterwell drilling.

The Super Dominator 400 is designed for maximum performance at high pressures.



AT A GLANCE:

(41/4-57/8")

SIZE

SHANK



(7 - 35 bar)

Hammer Overview	
Hammer Model	SD0M400
Part Number	600258
Shank	DHD340A
Thread connection	2 3/8" API Reg Pin Up
Minimum bit diameter	108 MM
Hammer flat size	65mm (2.56")
Weight	38 Kg (83.8 lbs)
Outside diameter	98mm (3.875")
Length (shoulder to shoulder)	1042mm (41")
Minimum weight on bit	250 Kg (550 lbs)
Maximum weight on bit	500 Kg (1100 lbs)

Parts List				
Hammer type	SD0M400			
Shank	DHD340A			ts
Part number	600258		Service Kit	Repair Kit
Item	Description	Part No.	SK45	RK83
1	Thread Protector	200111		
2	Top Adaptor	603215		
3	0-Ring	768040	1	
4	Non Return Valve	602633		
5	N.R.V. Spring	760108	1	
6	Make up Shim - 4.9mm	602634		
	Make up Shim - 5.3mm	602635		
	Make up Shim - 5.7mm	602636		
7	Compression Spring	760107		
8	Cylinder	603384		
9	Air Distributor	603266		
10	0-Ring	768050	1	
11	Piston	603383		
12	Snap Ring	783029	1	
13	Bit Retaining Ring	603586		
14	Chuck Spacer	602733	1	
15	Chuck	603218		
	Foot Valve	601773		

Alternative thread connections Thread connection 2 3/8" API Reg Pin Plain Diameter

800	71					
700				 	.*	11
400			-			
200	-					
100						

Figures are based on theoretical data

AT A GLANCE:

108mm - 150mm

(4 1/4 - 5 7/8")

SIZE





HALCO 4

100 - 507 psi (1 - 30 bar)

Hammer Overview Hammer Model Super Dominator 400 600224 Part Number Shank Halco 4 2 3/8" API Reg Pin Thread connection Minimum bit diameter 108 mm Hammer flat size 65 mm (2.560") Weight 38 Kg (83.77 lbs) Outside diameter 98 mm (3 7/8") Length (shoulder to shoulder) 1065 mm (42") Minimum weight on bit 250 Kg (550 lbs) Maximum weight on bit 500 Kg (1100 lbs)

Hammer type	Super Dominator 400		Mainte	nanco
Shank	HALCO 4			ts
Part number	600224		Service Kit	Repa Kit
Item	Description	Part No.	SK30	RK5
1	Thread Protector	200111		
2	Top Adaptor	603215		
3	0-Ring	768040	1	
4	N.R.V.	602633		
5	N.R.V. Spring	760108	1	
6	Shim - 4.9mm	602634		
	Shim 5.3mm	602635		
	Shim - 5.7mm	602636		
7	Compression Spring	760107		
8	Air Distributor	603266		
9	O'Ring	768050	1	
10	Cylinder	603390		
11	Piston	603396		
12	Snap Ring	783029	1	
13	Containment Band	792037	1	
14	Bit Retaining Ring	603793		
15	Chuck Lock Ring	602733	1	
16	Chuck	603273		
17	End Cap	741019		
	Foot Valve	601641		

Air Consumption

Figures are based on theoretical data

4" Super Dominator 400

SUPER DOMINATOR 400

The Super Dominator 400 is a heavy duty hammer with thicker 98mm (3.8") diameter outer components to provide extra service life in abrasive conditions and is suitable for waterwell drilling.

The Super Dominator 400 is designed for maximum performance at high pressures.





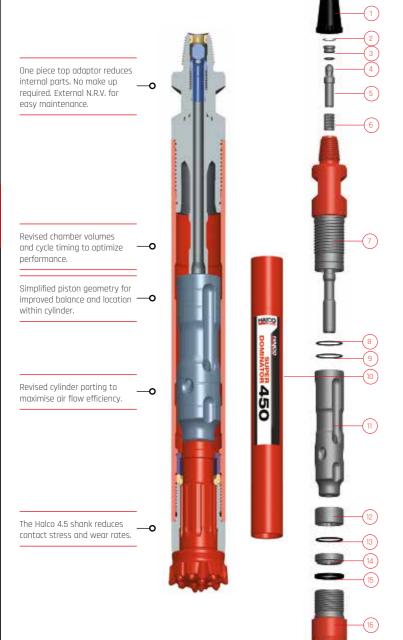
4" Super Dominator 450

SUPER DOMINATOR 450

The Super Dominator 450 has been specifically designed for high production drilling in blast hole applications.

The hammer is robust and has few parts, making it user friendly and reliable. The Super Dominator 450 is fitted with a N.R.V (Non Return Valve) in the top adaptor for a quick, easy inspection and maintenance operation. A fixed air distributor in the top adaptor means the 450 requires no shimming which simplifies servicing. It also has no liner which increases the piston power output.

The Super Dominator 450 utilizes Halco's 12 spline shank which has a simplistic robust geometry combined with increased drive contact area.



Hammer Overview	
Hammer Model	SD0M450
Part Number	600382
Shank	Halco 4.5
Thread connection	2 3/8" API Reg Pin Up
Minimum bit diameter	110 MM
Hammer flat size	65mm (2.56")
Weight	38.5 Kg (84.7 lbs)
Outside diameter	100.5mm (4.0")
Length (shoulder to shoulder)	914mm (36.0")
Minimum weight on bit	250 Kg (550 lbs)
Maximum weight on bit	500 Kg (1100 lbs)

Hammer type	SD0M400	SD0M400		
Shank	Halco 4.5	Ki		
Part number	600382		Service Kit	Repai Kit
Item	Description	Part No.	SK59	RK93
1	Thread Protector	200111		
2	Snap Ring	783049	1	
3	N.R.V. Seat	603919		
4	O-Ring	768187	1	
5	Non Return Valve	603918		
6	N.R.V. Spring	760142	1	
7	Top Adaptor	603946		
8 & 9	0-Ring (2)	768190	2	
10	Cylinder	604387		
11	Piston	604392		
12	Bit Guide Bush	604314		
13	0-Ring	768189	1	
14	Bit Retaining Ring	603948		
15	Chuck Lock Ring	602733	1	
16	Chuck	603939		
	Foot Valve	603951		

1000 10		000501	
Alternative thread	connections		
Part Number	TBA		
Thread connection	2 7/8" API Reg Pin		

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900								- 4
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100				_	_	_	-	-
0		-						_

Figures are based on theoretical data

4" Super Dominator 450HD

(7 - 35 bar)

AT A GLANCE:

4 5/16 - 5 1/2"

Hammer Overview	
Hammer Model	SDOM450HD
Part Number	600421
Shank	Halco 4.5
Thread connection	2 3/8" API Reg Pin Up
Minimum bit diameter	115MM
Hammer flat size	65mm (2.56")
Weight	42.0 Kg (92.6 lbs)
Outside diameter	103.5mm (4.074")
Length (shoulder to shoulder)	914mm (36.0")
Minimum weight on bit	250 Kg (550 lbs)
Maximum weight on bit	500 Kg (1100 lbs)

Parts List				
Hammer type Shank	Super Dominator 450HD Halco 4.5		Mainte Ki	
Part number	600421		Service Kit	Repo Kit
Item	Description	Part No.	SK59	RK14
1	Thread Protector	200111		
2	Snap Ring	783049	1	
3	N.R.V. Seat	603919		
4	0-Ring	768187	1	
5	Non Return Valve	603918		
6	N.R.V. Spring	760142		
7	Top Adaptor	600677		
8 & 9	0-Ring (2)	768190	1	
10	Cylinder	602555		
11	Piston	604392		
12	Guide Bush	604314		
13	0-Ring	768189	1	
14	Bit Retaining Ring	603948		
15	Chuck Lock Ring	602733	1	
16	Chuck	DP516		
17	End Cap	741019		
	Foot Valve	603951		

r are maniber	IDA
Thread connection	2 7/8" API Reg Pin
Air Consumption	n
900	
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Alternative thread connections

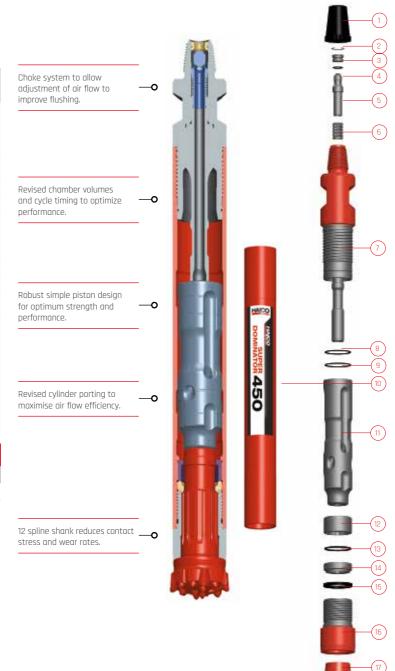
Figures are based on theoretical data

SUPER DOMINATOR 450HD

The Super Dominator 450HD has been specifically designed to provide more impact for high production drilling in blast hole applications.

The hammer is robust and has few parts, making it user friendly and reliable. The Super Dominator 450HD is fitted with a N.R.V (Non Return Valve) in the top adaptor for a quick, easy inspection and maintenance operation. A fixed air distributor in the top adaptor means the 450HD requires no shimming which simplifies servicing. It also has no liner which increases the piston power output.

The Super Dominator 450HD utilizes Halco's 12 spline shank which has a simplistic robust geometry combined with increased drive contact area. contact area.



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Hammers

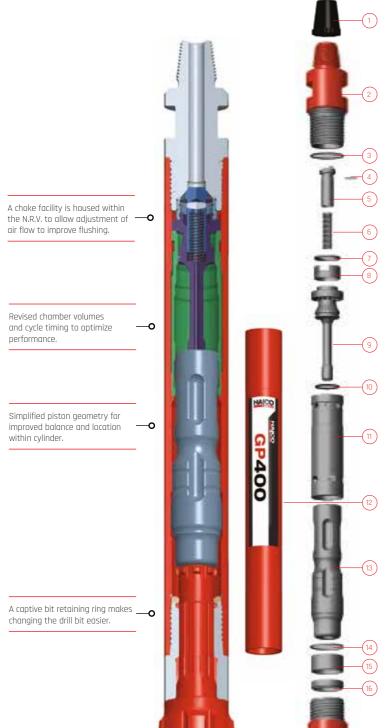
4" Mach 44

4" GP400 - DHD340

GP 400

The GP400 is a high performance hammer which can drill under a head of water, typically suited to Waterwell and Geothermal applications due to its non-ported piston design.

It features a choke facility which helps to adjust air flow through the hammer.



AT A GLANCE: SIZE SHANK **AIR PRESSURE** 108mm - 140mm DHD 340 100 - 435 psi 4 1/4 - 5 1/2" TD 40 (7 - 30 bar)

Hammer Overview	
Hammer Model	GP400
Part Number	600466
Shank	DHD340
Thread connection	2 3/8" API Reg Pin Up
Minimum bit diameter	108 MM
Hammer flat size	66mm (2.560")
Weight	40 Kg (122.3 lbs)
Outside diameter	98mm (3.858")
Length (shoulder to shoulder)	954mm (37.5")
Minimum weight on bit	250 Kg (550lbs)
Maximum weight on bit	500 Kg (1100lbs)

Hammer type	GP400			
Shank	DHD340		Ki	
Part number	600466		Service Kit	Repai Kit
Item	Description	Part No.	SK72	RK123
1	Thread Protector	200111		
2	Top Adaptor	602646		
3	0-Ring	768190	1	
4	Choke - Solid	604480	1	
	Choke - 1/8"	604481	1	
	Choke - 3/16"	604482	1	
5	Non Return Valve	604444		
6	N.R.V. Spring	760079	1	
7	Make up Shim - 4.9mm	602634		
	Make up Shim - 5.3mm	602635		
	Make up Shim - 5.7mm	602636		
8	Compression Ring	604994		
9	Air Distributor	604992		
10	O-Ring	768204	1	
11	Liner	604991		
12	Cylinder	604990		
13	Square Snap Ring	604995		
14	Piston	604993		
15	Snap Ring	783029	1	
16	Bit Retaining Ring	603255		
17	Chuck	603932		
	Foot Valve	601773		

Air Cons	umpu	011					
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0							
100	150 200		300 PRESSURE (PSI)	350 400	450	500	

Figures are based on theoretical data

AT A GLANCE:

Maximum weight on bit

SIZE



AIR PRESSURE

500 Kg (1100lbs)

110mm - 140mm 4 5/6 - 5 1/2"	Halco 4	100 - 435 ps (7 - 30 bar)
Hammer Overview		
Hammer Model		MACH44
Part Number		600070
Chank		Ualco 4

Part N Shank Halco 4 2 3/8" API Reg Pin Up Thread connection Minimum bit diameter 110 MM Hammer flat size 65mm (2.560") 35.3 Kg (77.82 lbs) Weight Outside diameter 95mm (3.75") Length (shoulder to shoulder) 1000mm (39.38") 250 Kg (550lbs) Minimum weight on bit

Hammer type	MACH44			
Shank	Halco 4		Ki	
Part number	600070		Service Kit	Repai Kit
Item	Description	Part No.	SK02	RK02
1	Thread Protector	200111		
2	Top Adaptor	601632		
3	0-Ring	768040	1	
4	Non Return Valve	602330		
5	N.R.V. Spring	760084	1	
6	N.R.V. Seat	601778		
7	N.R.V. Finger	601717		
8	Make up Shim 0.5mm	601640	1	
	Make up Shim 1.0mm	601720	1	
	Make up Shim 1.5mm	601721	1	
8	Compression Ring	601635	1	
10	0-Ring	768050	1	
11	Air Distributor	601868		
12	Cylinder	601865		
13	Snap Ring	783014	1	
14	Piston	602456		
15	Snap Ring	783014	1	
16	Bit Retaining Ring	601945		
17	Chuck Spacer	601431	1	
18	Chuck	601439		
	Foot Valve	601641		

Air Consumption

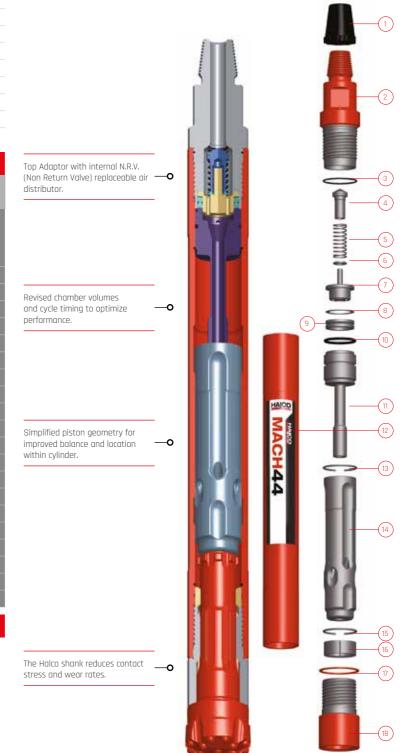


Figures are based on theoretical data

MACH 44

The Mach 44 is a general purpose hammer suitable for all rock conditions at a wide range of air pressures.

With a proven track record of performance and reliability, the Mach 44 operates at a high frequency which makes it ideal for broken unstable ground conditions.





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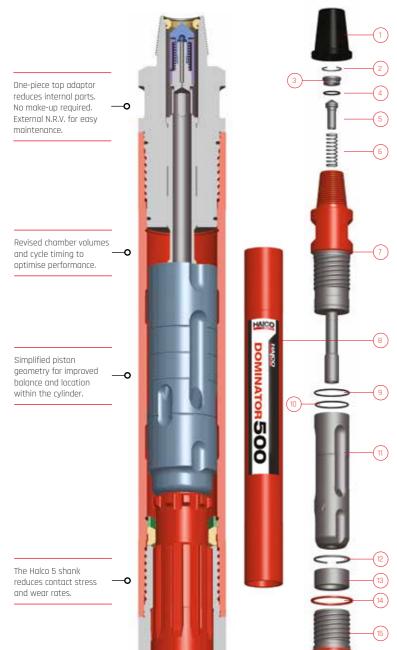
5" Dominator 500

DOMINATOR 500

The Dominator 500 is suitable for drilling at a wide range of air pressures making it a class leader in performance.

The Dominator 500 is ideal for General purpose and Drill & Blast applications. The Dominator 500 has a one-piece top adaptor with N.R.V fitted to eliminate shimming and it has no liner which increases the piston blow energy.

The Dominator 500 uses a few tools for maintenance, making it easy to maintain and service.



AT A GLANCE: \bigcirc SIZE SHANK **AIR PRESSURE** 100 - 507 psi 127mm - 165mm 5 - 6 1/2" (7 - 35 bar)

D0M500
600120
Halco 5
3 1/2" API Reg Pin Up
127 MM
90mm (3.54")
58.0 Kg (83.8 lbs)
118mm (4.65")
980mm (38.6")
400 Kg (900 lbs)
900 Kg (1980 lbs)

Parts List				
Hammer type	D0M500		Mainte	enance
Shank	HALCO 5		Ki	
Part number	600120		Service Kit	Repair Kit
Item	Description	Part No.	SK72	RK123
1	Thread Protector	201701		
2	Snap Ring	783028	1	
3	N.R.V. Seat	602703		
4	O-Ring	768144	1	
5	Non Return Valve	602330		
6	N.R.V. Spring	760084	1	
7	Top Adaptor	602704		
8	Cylinder	602457		
9	O-Ring	768091	1	
10	O-Ring	768043	1	
11	Piston	602459		
12	Snap Ring	783025	1	
13	Bit Retaining Ring	602430		
14	Chuck Spacer	602433	1	
15	Chuck	602458		
	Foot Valve	601843		

1400								
1200	-							
1000	_		_					
800	-		-					
900				•				
400		-						
200	-							
100	150	200	250	300 PSi	300	400	450	

5" Super Dominator 500

SIZE

AT A GLANCE:

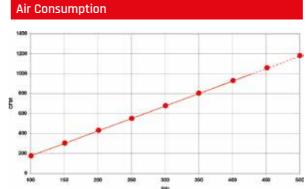
SHANK

140mm - 165mm 5 1/2 - 6 1/2"

AIR PRESSURE 100 - 507 psi (7 - 35 bar)

SD0M500
600267
DHD350
3 1/2" API Reg Pin Up
140 MM
90mm (3.54")
58.0 Kg (83.8 lbs)
118mm (4.65")
975mm (38.40")
400 Kg (900 lbs)
900 Kg (1980 lbs)

Darte Liet					
Parts List					
Hammer type	D0M500				
Shank	DHD350				
Part number	600267		Service Kit	Repo Kit	
Item	Description	Part No.	SK02	RKO	
1	Thread Protector	201701			
2	Snap Ring	783028	1		
3	N.R.V. Seat	603510			
4	O-Ring	786144	1		
5	Non Return Valve	603554			
6	N.R.V. Spring	760135	1		
7	N.R.V. Shield	603652			
8	Top Adaptor	603513			
9	Cylinder	603368			
10	O-Ring	768091	- 1		
11	O-Ring	768043	- 1		
12	Piston	603369			
13	Snap Ring	783025	- 1		
14	Bit Retaining Ring	602706			
15	Chuck Lock Ring	603104	1		
16	Chuck Spacer	602433	1		
17	Chuck	602549			
	Foot Valve	601902			



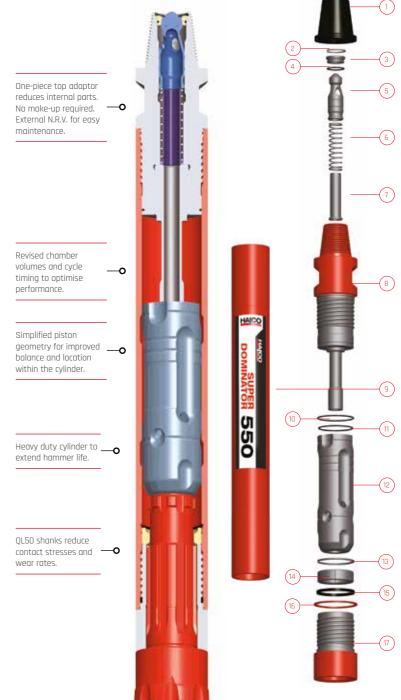
Figures are based on theoretical data

SUPER DOMINATOR 500

Super Dominator 500 is a class leader in performance and is suitable for drilling at a wide range of air pressures but excels at high working pressures.

Combining the raw power of the Super Dominator 500 with extended life for abrasive conditions, the Super Dominator 500 has a one piece top adaptor with N.R.V (Non Return Valve) fitted for easy inspection and an integral finger to reduce maintenance and eliminating shimming.

The Super Dominator 500 has no liner which increases the piston blow energy and reduces parts required.





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YOUR DRILLING EXPERT

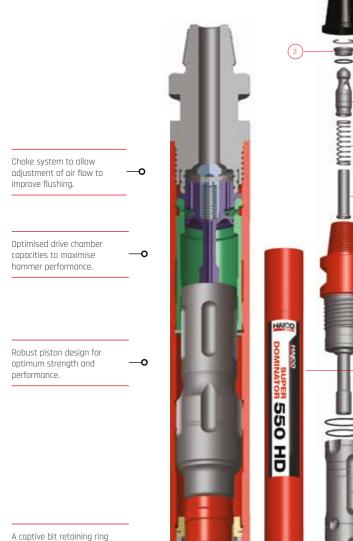
5" Super Dominator 550HD

SUPER DOMINATOR 550HD

Super Dominator 550HD is a class leader in performance and is suitable for drilling at a wide range of air pressures but excels at high working pressures.

Combining the raw power of the Super Dominator 500 with extended life for abrasive conditions, the Super Dominator 550HD has a larger outside diameter, a one piece top adaptor with N.R.V (Non Return Valve) fitted for easy inspection and an integral finger to reduce maintenance and eliminating shimming.

The Super Dominator 550HD has no liner which increases the piston blow energy and reduces parts required.



AT A GLANCE:		
		※
SIZE	SHANK	AIR PRESSURI
140mm - 165mm	DHD350	100 - 507 psi

Hammer Overview	
Hammer Model	SDOM550HD
Part Number	600293
Shank	DHD350
Thread connection	3 1/2" API Reg Pin Up
Minimum bit diameter	140 MM
Hammer flat size	90mm (3.54")
Weight	67.0 Kg (147.4 lbs)
Outside diameter	124.5mm (4.85")
Length (shoulder to shoulder)	975mm (38.4")
Minimum weight on bit	400 Kg (900 lbs)
Maximum weight on bit	900 Kg (1980 lbs)

)	Parts List				
	Hammer type	SDOM550HD			
	Shank	DHD350			
-	Part number	600293		Service Kit	Repair Kit
)	Item	Description	Part No.	SK72	RK123
ノ	1	Thread Protector	201701		
	2	Snap Ring	783028	1	
)	3	N.R.V. Seat	603510		1
)	4	O-Ring	786144	1	1
	5	Non Return Valve	603554		1
	6	N.R.V. Spring	760135	1	1
	7	N.R.V. Shield	603652	1	1
	8	Top Adaptor	603661		
	9	Cylinder	603370		
	10	O-Ring	768091	1	1
	11	O-Ring	768043	1	1
	12	Piston	603369		
	13	Snap Ring	783025	1	1
ソ	14	Bit Retaining Ring	602706		1
	15	Chuck Lock Ring	603104	1	1
1)	16	Chuck Spacer	602863	1	1
δ.	17	Chuck	602866		1
,		Foot Valve	601902		

	1400								
	1200								
	1000	-	-		-				
	600	-		-		-			
CFM	600	_	-		-		-		
	400					_			
	200	•		-	-	-			
	100	150	200	250	300 PRI	360	400	450	

AT A GLANCE:







140mm - 165mm 5 1/2 - 6 1/2"

SHANK QL50

(7 - 35 bar)

Hammer Overview	
Hammer Model	SDOM550HD
Part Number	600294
Shank	QL50
Thread connection	3 1/2" API Reg Pin Up
Minimum bit diameter	140 MM
Hammer flat size	90mm (3.54")
Weight	67.0 Kg (147.4 lbs)
Outside diameter	124.5mm (4.85")
Length (shoulder to shoulder)	955mm (37.6")
Minimum weight on bit	400 Kg (900 lbs)
Maximum weight on bit	900 Kg (1980 lbs)

Parts List			_	
Hammer type	SDOM550HD			
Shank	QL50			
Part number	600294		Service Kit	Repa Kit
Item	Description	Part No.	SK02	RKO
1	Thread Protector	201701		
2	Snap Ring	783028	1	
3	N.R.V. Seat	603510		
4	O-Ring	786144	1	
5	Non Return Valve	603554		
6	N.R.V. Spring	760135	1	
7	N.R.V. Shield	603652	1	
8	Top Adaptor	603661		
9	Cylinder	603370		
10	O-Ring	768091	1	
11	O-Ring	768043	1	
12	Piston	603524		
13	Snap Ring	783025	1	
14	O-Ring	768043	1	
15	Guide Bush	603520		
16	Bit Retaining Ring	604981		
17	Chuck Lock Ring	603104	1	
18	Chuck	604980		
	Foot Valve	603252		

1400	-	T	1	
1200		-		- 1
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800		-		
600			•	
400	-			
3010.7				

Figures are based on theoretical data

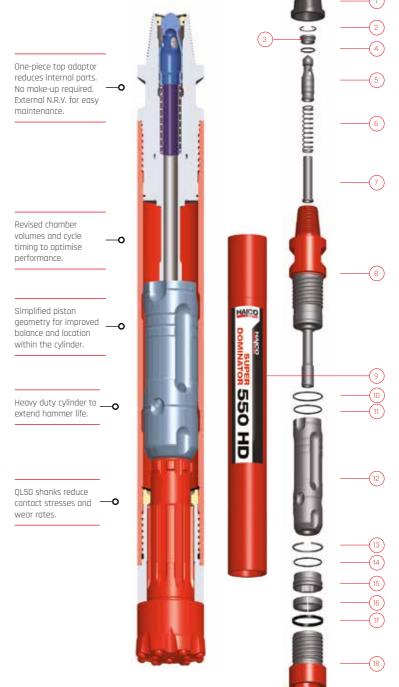
5" Super Dominator 550HD

SUPER DOMINATOR 550HD

Super Dominator 550HD is a class leader in performance and is suitable for drilling at a wide range of air pressures but excels at high working pressures.

Combining the raw power of the Super Dominator 500 with extended life for abrasive conditions, the Super Dominator 550HD has a larger outside diameter, a one piece top adaptor with N.R.V (Non Return Valve) fitted for easy inspection and an integral finger to reduce maintenance and eliminating shimming.

The Super Dominator 550HD has no liner which increases the piston blow energy and reduces parts required.



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makes changing the drill

bit easier.

YOUR DRILLING EXPERT

5" GP500 - DHD350

GP500

The GP500 is a high performance hammer which can drill under a head of water, typically suited to Waterwell and Geothermal applications due to its non-ported piston design.

It features a choke facility which helps to adjust air flow through the hammer.

			1	1
	- 4		d	
		116		2
system to allow				3

Choke improve flushing.

Optimised drive chamber capacities to maximise hammer performance.

Robust piston design for optimum strength and performance.

 \multimap

A captive bit retaining ring makes changing the drill bit easier.



	Hammer Overview	
	Hammer Model	GP500
	Part Number	600426
	Shank	DHD350
	Thread connection	3 1/2" API Reg Pin Up
	Minimum bit diameter	140 MM
١.	Hammer flat size	66mm (64.750")
′	Weight	60 Kg (132.3 lbs)
	Outside diameter	126mm (4.96")
	Length (shoulder to shoulder)	1074mm (42.3")
	Minimum weight on bit	400 Kg (900 lbs)
)	Maximum weight on bit	900 Kg (1980 lbs)

Parts List				
Hammer type	GP500			
Shank	DHD350		Ki	
Part number	600426		Service Kit	Repair Kit
Item	Description	Part No.	SK83	RK138
1	Thread Protector	201701		
2	Top Adaptor	604558		
3	Choke - Blank	604480	1	
	Choke - 1/8"	604481	1	
	Choke - 3/16"	604482	1	
4	Non Return Valve	604444		
5	N.R.V. Spring	760079	1	
6	Make up Shim - 4.5mm	604446		
	Make up Shim - 5.0mm	604447		
	Make up Shim - 5.5mm	604448		
7	Compression Spring	760109		
8	Air Distributor	604442		
9	O-Ring	768202	1	
10	Liner	604932		
11	Square Snap Ring	604937	1	
12	Cylinder	604931		
13	Piston	604439		
14	Snap Ring	783054	1	
15	Bit Retainer Ring	604689		
16	Chuck	604688		
	Foot Valve	601902		

Alternative thread connections 600429

2 3/8" API Reg Pin Up Thread connection

Air Consumption							
1600							
1400							
⊋ 1200							
AIR CONSUMPTION (CFM) 009 000							
MP 800					——GW500 (blank) ——GW500 (1/8")		
S 600					GW500 (3/16*)		
₹ 400							
200							
0			200 200	400 450			

Figures are based on theoretical data

AT A GLANCE:

140mm - 165mm

5 1/2 - 6 1/2"

SIZE

SHANK

QL50

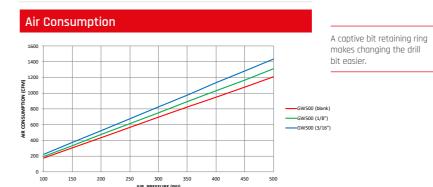
AIR PRESSURE 100 - 435 psi (7 - 30 bar)

Hammer Overview	
Hammer Model	GP500
Part Number	600448
Shank	QL50
Thread connection	3 1/2" API Reg Pin Up
Minimum bit diameter	130 MM
Hammer flat size	90mm (3.543")
Weight	60 Kg (132.3 lbs)
Outside diameter	126mm (4.96")
Length (shoulder to shoulder)	1053mm (41.456")
Minimum weight on bit	400 Kg (900 lbs)
Maximum weight on bit	900 Kg (1980 lbs)

Parts List				
Hammer type	GP500		Mainte	enance
Shank	QL50			
Part number	600448		Service Kit	Repa Kit
Item	Description	Part No.	SK83	RK15
1	Thread Protector	201701		
2	Top Adaptor	604558		
3	Choke - Blank	604480	1	
	Choke - 1/8"	604481	1	
	Choke - 3/16"	604482	1	
4	Non Return Valve	604444		
5	N.R.V Spring	760079	1	
6	Make up Shim - 4.5mm	604446		
	Make up Shim - 5.0mm	604447		
	Make up Shim - 5.5mm	604448		
7	Compression Spring	760109		
8	Air Distributor	604442		
9	O-Ring	768202	1	
10	Liner	604932		
11	Square Snap Ring	604937	1	
12	Cylinder	604931		
13	Piston	604936		
14	Snap Ring	783054	1	
15	Guide Bush	604935		
16	O-Ring	768043	1	
17	Bit Retaining Ring	604933		
18	Chuck Lock ring	604949		
19	Chuck	604934		
	Foot Valve	603252		

Alternative thread connections 600429 Part Number

2 3/8" API Reg Pin Up Thread connection



GP500 - QL50

The GP500 high performance hammer drills under a head of water typically suited to Waterwell and Geothermal applications due to its non-ported piston design.

5" GP500 - QL50

It features a choke facility which helps to adjust air flow through the hammer.



YOUR DRILLING EXPERT

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ROCK TOOLS

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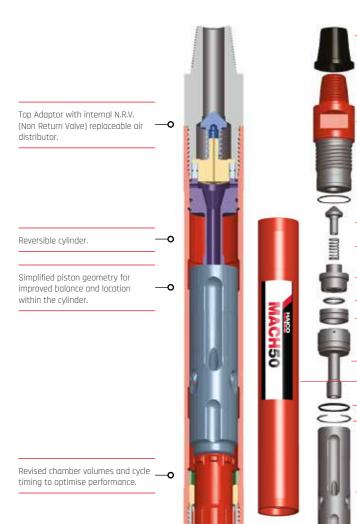
5" Mach 50

MACH 50

The Mach 50 is a general purpose hammer suitable for all rock conditions at a wide range of air pressures.

With a proven track record of performance and reliability, the Mach 50 operates at a high frequency which makes it ideal for broken unstable ground conditions.

The hammer is fitted with a reversible cylinder to prolong the service life, it also requires only a few tools to service and maintain.



AT A GLANCE: SIZE SHANK **AIR PRESSURE** 127mm - 165mm HALCO 5 100 - 435 psi (7 - 30 bar) 5" - 6 1/2"

Hammer Overview	
Hammer Model	MACH 50
Part Number	600046
Shank	Halco 5
Thread connection	3 1/2" API Reg Pin Up
Minimum bit diameter	127MM
Hammer flat size	90mm (3.544")
Weight	54 Kg (119.0 lbs)
Outside diameter	114mm (4.5")
Length (shoulder to shoulder)	1012mm (40")
Minimum weight on bit	400 Kg (900 lbs)
Maximum weight on bit	900 Kg (1980 lbs)

Hammer type	GP500			
Shank	Halco 5			ts
Part number	600046		Service Kit	Rep Ki
Item	Description	Part No.	SK03	RKC
1	Thread Protector	201701		
2	Top Adaptor	601698		
3	0-Ring	768043	1	
4	Non Return Valve	602285		
5	N.R.V. Spring	760084	1	
6	N.R.V. Finger	601702		
7	Make up Shim 0.5mm	601706	1	
	Make up Shim 1MM	601795	1	
	Make up Shim 1.5MM	601796	1	
8	Make up Ring	601700	1	
9	Air Distributor	601699		
10	Cylinder	601694		
11	0-Ring	768101	1	
12	Snap Ring	783013		
13	Piston	601695		
14	Snap Ring	783103	1	
15	Spacer	601705		
16	Bit Retaining Ring	602117		
17	Chuck Spacer	601603	1	
18	Chuck	601602		
	Foot Valve	601843		

	Air Co	nsumpti	on						
	1400		-1	7		_		1	
	1200	-	-	-			-	-	
	1000			+		-		- 1	_
Σ	8 00			-		-	-0.00	-	_
	600					-		+	_
	400			1	-	-	-	+	
	200			-	- 2	-		+	_
	0								
	10	00 150	200	250	300	350	400	450	50
					DCI				

AT A GLANCE:







152mm - 241mm 6" - 9 1/2"

DHD 360

100 - 500 psi (7 - 35 bar)

SD0M600
600272
DHD360
3 1/2" API Reg Pin Up
152 MM
101mm (4.0")
100 Kg (220 lbs)
140.0mm (5.511")
1139mm (44.8")
500 Kg (1100 lbs)
1500 Kg (3300 lbs)

Parts List				
Hammer type	SD0M600			
Shank	DHD360		ts	
Part number	600272	Service Kit	Repair Kit	
Item	Description	Part No.		
1	Thread Protector	201701		
2	Snap Ring	783050	1	
3	N.R.V. Seat	603872		
4	O-Ring	768112	1	
5	Non Return Valve	603554		
6	N.R.V. Spring	760135	1	
7	N.R.V. Shield	603652		
8	Top Adaptor	603506		
9	O-Ring	768140	1	
10	O-Ring	768055	1	
11	Cylinder	603584		
12	Piston	602891		
13	Snap Ring	783017	1	
14	O-Ring	747105	1	
15	Bit Guide Bush	602239		
16	Bit Retaining Ring	603749		
17	O-Ring	747105	1	
18	Chuck Spacer	601942	1	
19	Chuck	602495		
	Foot Valve	601595		

Air Consumption

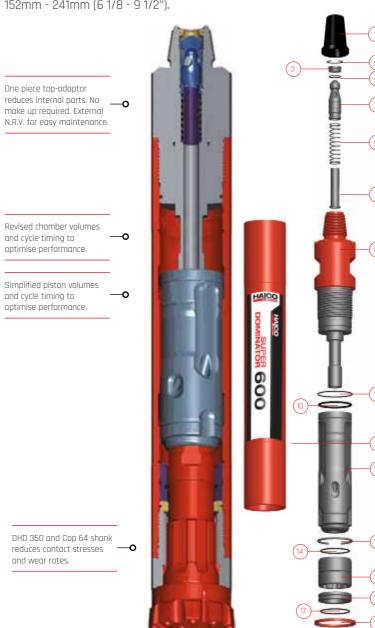
6" Super Dominator 600

SUPER DOMINATOR 600

The Super Dominator 600 is one of the fastest 6" hammers specifically designed for high production drilling in blast-hole

The Super Dominator 600 is a reduced weight hammer with waterwell drilling capabilities. The unique one piece top-adaptor with N.V.R. (Non-Return-Valve) makes it easy to maintain and service the hammer.

Super Dominator 600 requires only few tools to service and maintain the hammer. Suitable for operation at air pressures of 100 - 500psi (7 - 35bar). Drilling diameters of 152mm - 241mm (6 1/8 - 9 1/2").



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Halco Mach 50 shank reduces

contact stresses and wear rates.

YOUR DRILLING EXPERT

Hammers

6" GP600

6" Super Dominator 650HD Snub

SUPER DOMINATOR 650HD SNUB

The Super Dominator 650 HD combines the raw power of the Super Dominator 600 with the extended hammer life in abrasive conditions due to its heavy duty and reversible cylinder.

The unique one piece top adaptor with N.R.V (Non Return Valve) makes it easy to maintain and service.

Super Dominator 650 requires only a few simple tools to service and maintain the hammer.



AT A GLANCE:		
SIZE	© SHANK	** AIR PRESSURE
165mm - 220mm 6 1/2" - 8 5/8"	QL60	100 - 500 psi (7 - 35 bar)

Hammer Overview							
Hammer Model	SDOM650HD Snub						
Part Number	600467						
Shank	QL60						
Thread connection	3 1/2" API Reg Pin with carbides						
Minimum bit diameter	165 MM						
Hammer flat size	101mm (4.0")						
Weight	100 Kg (220 lbs)						
Outside diameter	146mm (5.478")						
Length (shoulder to shoulder)	1043mm (41.1")						
Minimum weight on bit	500 Kg (1100 lbs)						
Maximum weight on bit	1500 Kg (3300 lbs)						

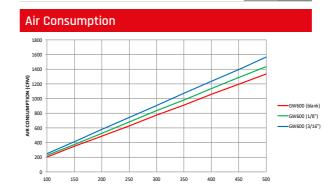
Hammer type Shank	SDOM650HD Snub QL60					
Part number	600467	600467				
Item	Description	Part No.	SK03	RK04		
1	Thread Protector	201701				
2	Snap Ring	783050	1			
3	N.R.V. Seat	603872				
4	O-Ring	768112	1			
5	Non Return Valve	603554				
6	N.R.V. Spring	760135	1			
7	N.R.V. Shield	603652				
8	Top Adaptor	603806				
9	O-Ring	747105	1			
10	O-Ring	768140	1			
11	Cylinder	605004				
12	Piston	605003				
13	Snap Ring	783017	1			
14	O-Ring	747105	1			
15	Bit Guide Bush	605005				
16	Bit Retaining Ring	603866				
17	Chuck Spacer	601928				
18	Chuck	604122				
	Foot Valve	602852				

1000	_
600	

AT A GLANCE: SHANK SIZE **AIR PRESSURE** QL60 100 - 500 psi DHD 360 (7 - 35 bar) 6 1/8 - 8"

Hammer Overview	
Hammer Model	GP600
Part Number	600427
Shank	QL60
Thread connection	3 1/2" API Reg Pin Up
Minimum bit diameter	152 MM
Hammer flat size	101mm (3.976")
Weight	86 Kg (132.3 lbs)
Outside diameter	140mm (5.51")
Length (shoulder to shoulder)	1035mm (40.7")
Minimum weight on bit	500 Kg (1100 lbs)
Maximum weight on bit	1500 Kg (3300 lbs)

Hammer type	GP600				
		Maintenance Kits			
Shank	QL60	ŲLБU			
Part number	600427		Service Kit	Rep Ki	
Item	Description	Part No.	SK68	RK1	
1	Thread Protector	201701			
2	Top Adaptor	604521			
3	O-Ring	768140	1	1	
4	Shim - 4MM	601946		1	
	Shim - 5MM	601947		1	
	Shim - 6MM	601948		1	
	Shim - 7MM	601949		1	
5	Compression Ring	760096		1	
6	Choke Plug - Blank	604480	1	1	
	Choke 1/8"	604481	1	1	
	Choke 3/16"	604482	1	1	
7	Non Return Valve	604444		1	
8	N.R.V Spring	760079	1	1	
9	Air Distributor	604514			
10	O-Ring	768043	1	1	
11	Liner	604930			
12	Square Snap Ring	604929	1	1	
13	Cylinder	604517			
14	Piston	604520			
15	Snap Ring	783056	1	1	
16	Guide Bush	604518		1	
17	O-Ring	747105	1	1	
18	Bit Retaining Ring	604693		1	
19	Chuck	604692		1	
	Foot Valve	602852			



Figures are based on theoretical data

GP 600

The GP600 is a high performance hammer which can drill under a head of water, typically suited to Waterwell and Geothermal applications due to its non-ported piston design.

It features a choke facility which helps to adjust air flow through the hammer.



YOUR DRILLING EXPERT

HACO

ROCK TOOLS

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Hammers

6" GP600 - QL60HD

GP600HD - QL60HD

Choke system to allow adjustment of air flow to improve flushing.

Optimised drive chamber

Robust piston design for

12 spline QL60 shank reduces —o contact stress and wear rates.

optimum strenath and performance.

capacities to maximise hammer performance,

⊸o

The GP600 is a high performance hammer which can drill under a head of water, so it is typically suitable for Waterwell and Geothermal applications due to its robust non-ported piston design.

A choke facility helps to adjust air flow through the hammer.



AT A GLANCE:

Hammer Overview	
Hammer Model	GP600HD
Part Number	600480
Shank	QL60
Thread connection	3 1/2" API Reg Pin Up
Minimum bit diameter	156 MM
Hammer flat size	101mm (3.976")
Weight	86 Kg (189.2 lbs)
Outside diameter	146mm (5.75")
Length (shoulder to shoulder)	1035mm (40.7")
Minimum weight on bit	500 Kg (1100 lbs)
Maximum weight on bit	1500 Kg (3300 lbs)

Hammer type	GP600HD			
Shank	QL60	Kits		
Part number	600480		Service Kit	Repair Kit
Item	Description	Part No.	SK84	RK156
1	Thread Protector	201701		
2	Top Adaptor	604562		
3	O-Ring	768140	1	
4	SHIM 4MM	601946		
	Make up Shim - 5mm	601947		
	Make up Shim - 6mm	601948		
	Make up Shim - 7mm	601949		
5	Compression Ring	760096		
6	Choke - Solid	604480	1	
	Choke - 1/8"	604481	1	
	Choke - 3/16"	604482	1	
7	Non Return Valve	604444		
8	N.R.V. Spring	760079	1	
9	Air Distributor	604514		
10	O-Ring	768043	1	
11	Liner	604930		
12	Square Snap Ring	604929		
13	Cylinder	605023		
14	Piston	604520		
15	Snap Ring	783056	1	
16	Guide Bush	604518		
17	O-Ring	747105		
18	Bit Retaining Ring	604693		
19	Chuck	605022		
	Foot Valve			

A	۱ir	Con	sum	ption	1						
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					AIR	PRESSURE (PSI)				

6" GP600HD - DHD360

SIZE

6 1/8 - 8"

AT A GLANCE:

SHANK

DHD360

AIR PRESSURE

100 - 500 psi (7 - 35 bar)

Hammer Overview	
Hammer Model	GP600HD
Part Number	600449
Shank	DHD360
Thread connection	3 1/2" API Reg Pin Up
Minimum bit diameter	156 MM
Hammer flat size	101mm (3.976")
Weight	86 Kg (189 lbs)
Outside diameter	144.75mm
Length (shoulder to shoulder)	1035mm (40.7")
Minimum weight on bit	500 Kg (1100 lbs)
Maximum weight on bit	1500 Kg (3300 lbs)

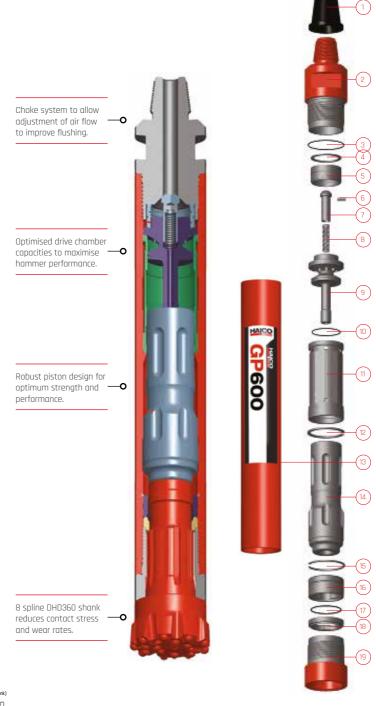
			_	
Hammer type	1/24			
Shank	DHD360			
Part number	600449		Service Kit	Repa Kit
Item	Description	Part No.	SK68	
1	Thread Protector	201701		
2	Top Adaptor	604562		
3	O-Ring	768140	1	
4	Shim 4MM	601946		
	Shim 5MM	601947		
	Shim 6MM	601948		
	Shim 7MM	601949		
5	Compression Ring	760096		
6	Choke Plug-Blank	604480	1	
	Choke - 1/8"	604481	1	
	Choke - 3/16"	604482	1	
7	N.R.V.	604444		
5	N.R.V Spring	760079	1	
8	Air Distributor	604514		
10	O-Ring	768043	1	
11	Liner	604930		
12	Square Snap Ring	604929	1	
13	Cylinder	604938		
14	Piston	604942		
15	Snap Ring	783056		
16	Guide Bush	604941	1	
17	O-Ring	747105	1	
15	Bit Retaining Ring	604940		
17	Chuck	604939		
	Foot Valve	601595		

Air Consumption ----GW600 (1/8")

GP600HD - DHD360

The GP600 is a high performance hammer which can drill under a head of water, so it is typically suitable for Waterwell and Geothermal applications due to its robust non-ported piston design.

A choke facility helps to adjust air flow through the hammer.





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6" Mach 60

Hammers

28

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AT A GLANCE: 米 SHANK SIZE AIR PRESSURE 100 - 435 psi (7 - 30 bar) 152mm - 203mm HALCO 6

Hammer Overview	
Hammer Model	MACH 60
Part Number	600035
Shank	Halco 6
Thread connection	3 1/2" API Reg Pin Up
Minimum bit diameter	152 MM
Hammer flat size	90mm (3.54")
Weight	89 Kg (196.2 lbs)
Outside diameter	138mm (5.43")
Length (shoulder to shoulder)	1095mm (3.54")
Minimum weight on bit	500 Kg (1100 lbs)
Maximum weight on bit	1500 Kg (3300 lbs)

Hammer type Shank	GP600 Halco 6		Mainte Ki	
Part number	600035		Service Kit	Repair Kit
Item	Description	Part No.	SK07	RK10
1	Thread Protector	201701		
2	Top Adaptor	601555		
3	Non Return Valve	601560		
4	N.R.V. Spring	760079	1	
5	N.R.V. Housing	601558		
6	Compression Ring	601562	1	
7	Make up Shim 0.5mm	601590	1	
	Make up Shim 1.0mm	601797	1	
	Make up Shim 1.5mm	601798	1	
8	Air Distributor	601557		
10	0-Ring	768130	1	
11	Snap Ring	783012	1	
12	Cylinder	601553		
13	Piston	601554		
14	Snap Ring	783012	1	
15	Bottom Spacer	601571		
16	Bit Retaining Ring	601573		
	0-Ring	747105	1	
17	Chuck Spacer	601563	1	
18	Chuck	601556		
	Foot Valve	601570		

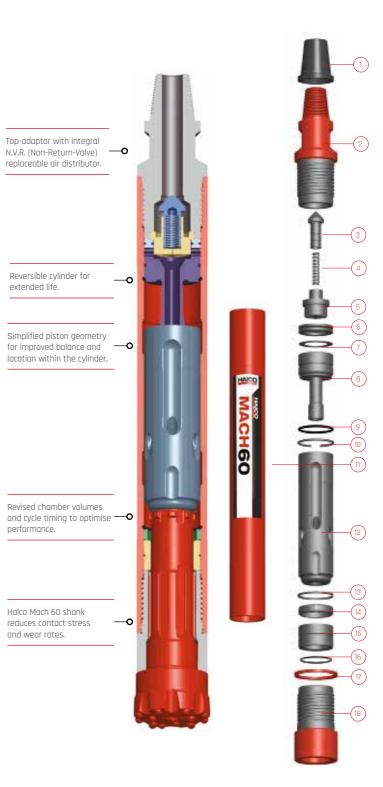
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MACH 60

The Mach 60 is a general purpose hammer suitable for all rock conditions at a wide range of air pressures.

With a proven track record of performance and reliability, the Mach 50 operates at a high frequency which makes it ideal for broken unstable ground conditions.

The hammer is fitted with a reversible cylinder to prolong the service life, it also requires only a few tools to service and maintain.





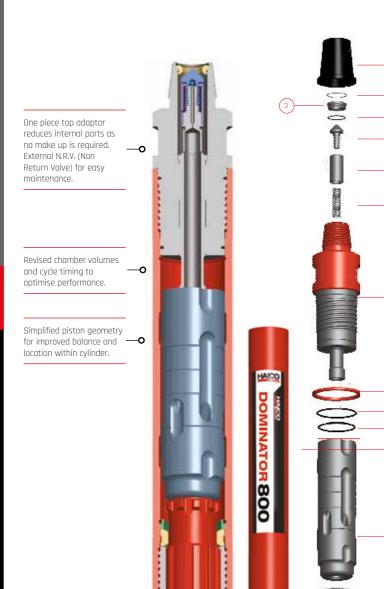
Hammers

8" Dominator 800

DOMINATOR 800

The Dominator 800 is a general purpose hammer suitable for a wide range of air pressures.

A low to mid range air volume hammer with a one piece top adaptor. The Dominator 800 has a unique air distributor finger which is integral with the top adaptor and requires no shimming which simplifies servicing.



AT A GLANCE: SIZE SHANK **AIR PRESSURE** 100 - 500 psi 200mm - 311mm **DHD 380**

(7 - 35 bar)

77/8 - 12 1/4"

Hammer Overview	
Hammer Model	D0M800
Part Number	600309
Shank	DHD380
Thread connection	4 1/2" API Reg Pin
Minimum bit diameter	200 MM
Hammer flat size	156mm (6.142")
Weight	181 Kg (399.03 lbs)
Outside diameter	182mm (7.165")
Length (shoulder to shoulder)	1254mm (49.37")
Minimum weight on bit	800 Kg (1760 lbs)
Maximum weight on bit	2000 Kg (4400 lbs)

Parts List				
Hammer type	D0M800			
Shank	DHD380		Ki	
Part number	600309		Service Kit	Repair Kit
Item	Description	Part No.	SK25	RK64
1	Thread Protector	207295		
2	Snap Ring	783034	1	
3	N.R.V. Seat	602887		
4	O-Ring	768150	1	
5	Non Return Valve	602285		
6	Spring Cover	603696		
7	N.R.V. Spring	760108	1	
8	Top Adaptor	603607		
9	Spacer	603576		
10	O-Ring	768103	1	
11	O-Ring	768145	1	
12	Cylinder	603687		
13	Piston	603755		
14	Snap Ring	783015	1	
15	Spacer	602840		
16	Containment Band	603549	1	
17	Bit Retaining Ring	603043		
18	Chuck Spacer	603576	1	
19	Chuck	603495		
	Foot Valve	601819		1

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AT A GLANCE:

SIZE





7 7/8 - 12 1/4"

QL80

AIR PRESSURE 100 - 500 psi (7 - 35 bar)

Hammer Overview	
Hammer Model	D0M800
Part Number	600374
Shank	QL80
Thread connection	4 1/2" API Reg Pin
Minimum bit diameter	200 MM
Hammer flat size	156mm (6.14")
Weight	180 Kg (396.8 lbs)
Outside diameter	182mm (7.165")
Length (shoulder to shoulder)	1180mm (46.4")
Minimum weight on bit	800 Kg (1760 lbs)
Maximum weight on bit	2000 Kg (4400 lbs)

Hammer type	D0M800	Mainte	enance	
Shank	QL80			
Part number	600374		Service Kit	Repai Kit
Item	Description	Part No.	SK78	RK131
1	Thread Protector	207295		
2	Snap Ring	783034	1	
3	N.R.V. Seat	602887		
4	O-Ring	768150	1	
5	Non Return Valve	602285		
6	N.R.V. Shield	603696		
7	N.R.V. Spring	760108	1	
8	Top Adaptor	603607		
9	Spacer	603576		
10	O-Ring	768103	1	
11	O-Ring	768145	1	
12	Cylinder	604344		
13	Piston	604343		
14	Snap Ring	783015	1	
15	0-Ring	768151	1	
16	Guide Bush	604346		
17	Bit Retaining Ring	604347		
18	Chuck Spacer	603576	1	
19	Chuck	604345		
	Foot Valve	603334		

Air Consumption 1200 ₹ 1000 600 400 200 PSI

8" Dominator 800

DOMINATOR 800

The Dominator 800 is a general purpose hammer suitable for a wide range of air pressures.

A low to mid range air volume hammer with a one piece top adaptor. The Dominator 800 has a unique air distributor finger which is integral with the top adaptor and reduces requirements for shimming.





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Halco Mach 80, IR DHD380

reduces contact stresses

and A63-SD8 shank

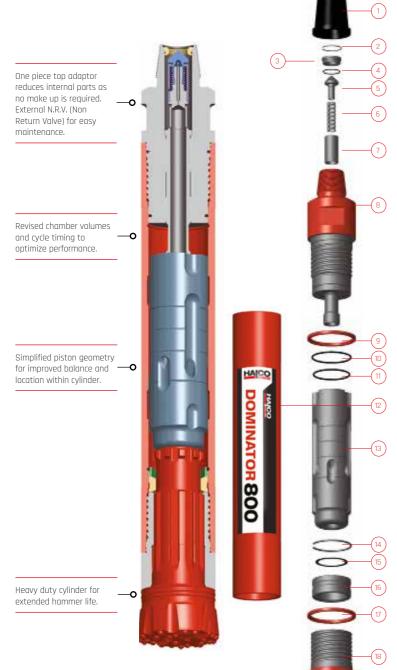
and wear rates.

8" Dominator 800

DOMINATOR 800

The Dominator 800 is a general purpose hammer suitable for a wide range of air pressures.

A low to mid range air volume hammer with a one piece top adaptor. The Dominator 800 has a unique air distributor finger which is integral with the top adaptor and reduces requirements for shimming.



AT A GLANCE: \bigcirc SIZE SHANK **AIR PRESSURE** 100 - 500 psi 200mm - 311mm HALCO 8 7 7/8 - 12 1/4" (7 - 35 bar)

Hammer Overview	
Hammer Model	D0M800
Part Number	600310
Shank	Halco 8
Thread connection	4 1/2" API Reg Pin
Minimum bit diameter	200 MM
Hammer flat size	156mm (6.14")
Weight	175 Kg (385.8 lbs)
Outside diameter	182mm (7.165")
Length (shoulder to shoulder)	1254mm (49.4")
Minimum weight on bit	800 Kg (1760 lbs)
Maximum weight on bit	2000 Kg (4400 lbs)

Parts List					
Hammer type	D0M800	Maintenan Kits			
Shank	Halco 8				
Part number	600310		Service Kit	Repair Kit	
Item	Description	Part No.	SK25	RK78	
1	Thread Protector	207295			
2	Snap Ring	783034	1		
3	N.R.V. Seat	602887			
4	O-Ring	768150	1		
5	Non Return Valve	602285			
6	N.R.V. Shield	603696			
7	N.R.V. Spring	760108	1		
8	Top Adaptor	603607			
9	Spacer	603576			
10	0-Ring	768103	1		
11	0-Ring	768145	1		
12	Cylinder	603687			
13	Piston	603754			
14	Snap Ring	783015	1		
15	Retaining Ring Band	603549			
16	Bit Retaining Ring	601677			
17	Chuck Spacer	603576	1		
18	Chuck	603685			
	Foot Valve	601675			

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AT A GLANCE:

SIZE





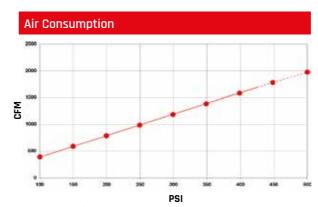
QL80

AIR PRESSURE 100 - 500 psi (7 - 35 bar)

222mm - 270mm 8 3/4 - 10 5/8"

Hammer Overview	
Hammer Model	DOM850
Part Number	600245
Shank	QL80
Thread connection	4 1/2" API Reg Pin
Minimum bit diameter	222 MM
Hammer flat size	125mm (6.14")
Weight	180 Kg (396.8 lbs)
Outside diameter	192mm (7.6")
Length (shoulder to shoulder)	1281mm (50.4")
Minimum weight on bit	800 Kg (1760 lbs)
Maximum weight on bit	2000 Kg (4400 lbs)

Parts List				
Hammer type	D0M850			
Shank	QL80			
Part number	600245		Service Kit	Repai Kit
Item	Description	Part No.	SK32	RK55
1	Thread Protector	207295		
2	Snap Ring	783034	1	
3	N.R.V. Seat	602887		
4	O-Ring	768150	1	
5	Non Return Valve	602285	1	
6	N.R.V. Cover	603696		
7	N.R.V. Spring	760108		
8	Top Adaptor	603353		
9	Spacer	603358		
10	O-Ring	768169	1	
11	Cylinder	603347		
12	Piston	603349		
13	Snap Ring	783039	1	
14	O-Ring	768169	1	
15	Bit Guide Bush	603360		
16	Bit Retaining Ring	603359		
17	Chuck Spacer	603358	1	
18	Chuck	603357		
	Foot Valve	603334		



Figures are based on theoretical data

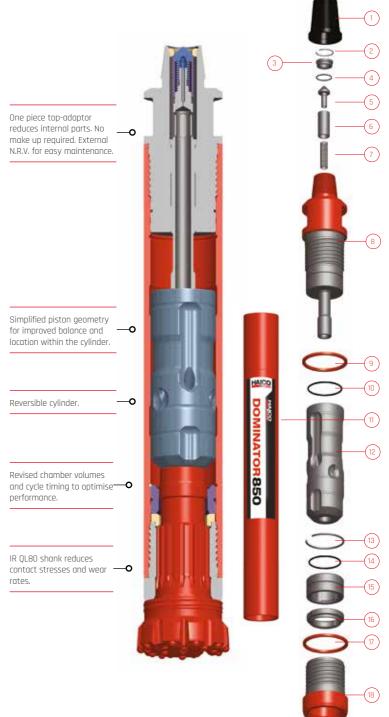
8" Dominator 850

DOMINATOR 850

The Dominator 850 has been designed for high performance drilling in hard to medium rock formations, particularly mining applications.

Its class leading performance has been achieved with a larger piston and valveless air cycle providing 50% increase in stroke.

The Dominator 850 has a reversible cylinder for prolonged hammer life and benefits from a one piece top adaptor with N.R.V (Non Return Valve), this makes it easier to maintain and service the hammer.



YOUR DRILLING EXPERT

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ROOK TOOLS

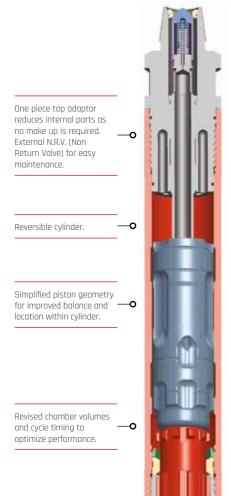
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8" Dominator 880 DW

DOMINATOR 880 DW

The Dominator 880 Deep Well hammer has been specifically designed for drilling deep holes under a head of water.

The wide body diameter of the Dominator 880 DW allows for an increased piston weight and improved performance.





AT A GLANCE:





SIZE 200mm - 311mm 7 7/8 - 12 1/4"

DHD 380

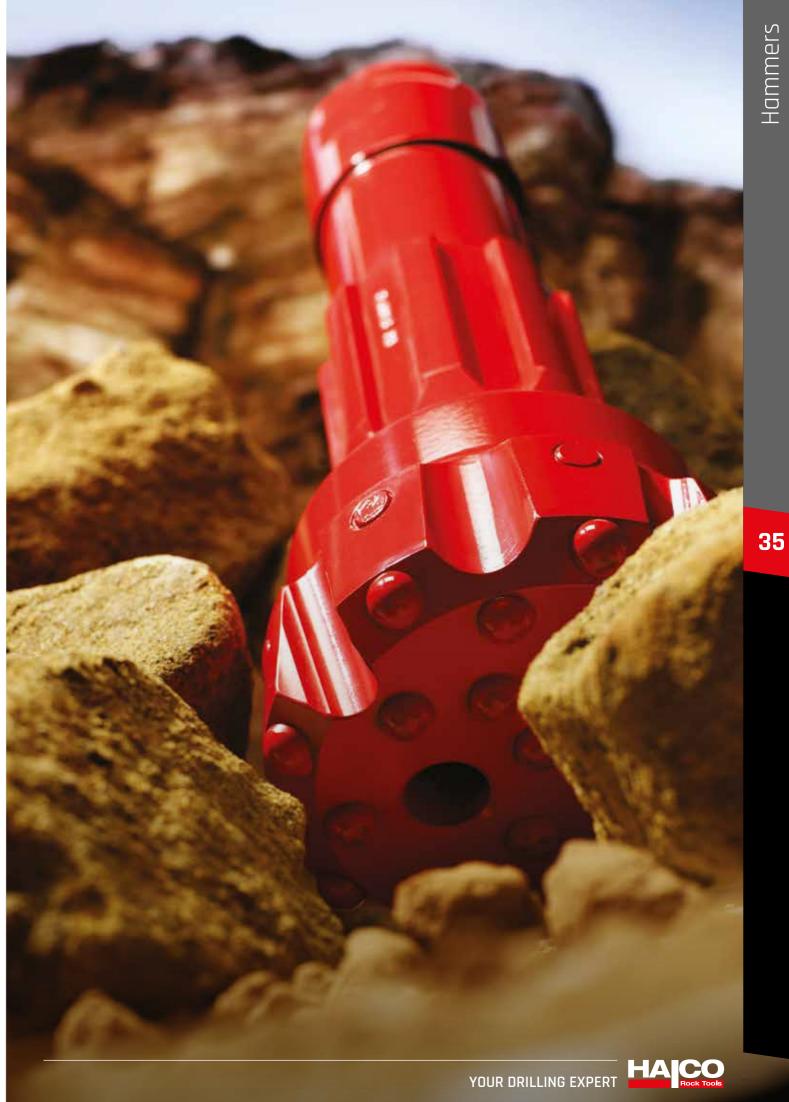
AIR PRESSURE 100 - 507 psi (7 - 35 bar)

Hammer Overview	
Hammer Model	DOMINATOR 880 DW
Part Number	600261
Shank	DHD 380
Thread connection	4 1/2" API Reg Pin
Minimum bit diameter	200 MM
Hammer flat size	156 mm (6.142")
Weight	177 KG (390.21 lbs)
Outside diameter	182 mm (7.165")
Length (shoulder to shoulder)	1263 mm (49.724")
Minimum weight on bit	800 Kg (1760 lbs)
Maximum weight on bit	2000 Kg (4400 lbs)

Pul (5 LISC				
Hammer type	DOMINATOR 880 DW			
Shank	DHD 380			
Part number	600261		Service Kit	Repair Kit
Item	Description	Part No.	SK25	RK64
1	Thread Protector	207295		
2	Snap Ring	783034	1	
3	N.R.V. Seat	602887		
4	O-Ring	768150	1	
5	Non Return Valve	602285		
6	N.R.V. Cover	603696		
7	N.R.V. Spring	760108		
8	Top Adaptor	603498		
9	Spacer	603576		
10	O-Ring	768103	1	
11	O-Ring	768145	1	
12	Cylinder	603496		
13	Piston	602743		
14	Snap Ring	783015	1	
15	Spacer	602840	1	
16	Containment Band	603549		
17	Bit Retaining Ring	603043		
18	Chuck Spacer	603576		
19	Chuck	603495		
	Foot Valve	601819		

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		100	150	:	200	2	50	300	1 :	350	400	4	150	50

Figures are based on theoretical data



Optional bit catcher

design to eliminate fishing —o operations in the event of a shank failure.

Hammers

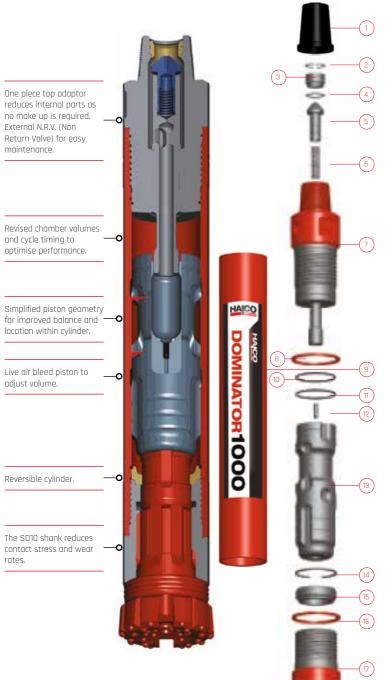
10" Dominator 1000

DOMINATOR 1000

The Dominator 1000 incorporates a unique piston design for high performance and reliability especially in Waterwell applications.

This hammer is suitable for a wide range of air pressures. Though its optimum performance is reached at air pressures of 200psi (14 bar) and above. It has been designed with the heaviest piston in its class, (weighing in at 87.6 kg) to provide excellence performance. To assist with maintenance, it has a captive bit ring and a reversible cylinder thus prolonging its life and ultimately reducing costs.

The Dominator 1000 benefits from a one piece top adaptor with N.R.V (Non Return Valve), this makes it easier to maintain and service the hammer.



Hammer Overview	
Hammer Model	D0M1000
Part Number	600248
Shank	SD10
Thread connection	6 5/8" API Reg Pin
Minimum bit diameter	254 MM
Hammer flat size	200mm (7.875")
Weight	367 Kg (809 lbs)
Outside diameter	230mm (9.06")
Length (shoulder to shoulder)	1390mm (54.7")
Minimum weight on bit	1500 Kg (3400 lbs)
Maximum weight on bit	3500 Kg (7700 lbs)

Hammer type	D0M1000		Maintenance Kits		
Shank	SD10				
Part number	600248		Service Kit	Repai Kit	
Item	Description	Part No.	SK29	RK50	
1	Thread Protector	200112			
2	Circlip	777001	1		
3	N.R.V. Seat	602286			
4	0-Ring	768133	1		
5	Non Return Valve	602288			
6	N.R.V. Spring	760055	1		
7	Top Adaptor	603429			
8	Spacer	603432			
9	Cylinder	603434			
10 & 11	0-Ring	768172	2		
12	Bleed Plug - Blank	602499			
	Bleed Plug - 3mm	602500			
	Bleed Plug - 4mm	602501			
	Bleed Plug - 5mm	602502			
	Bleed Plug - 6mm	602503			
	Bleed Plug - 8mm	602874			
13	Piston	603433			
14	Snap Ring	783040	1		
15	Bit Retaining Ring	603435			
16	Chuck Spacer	603432	1		
17	Chuck	603436			
	Foot Valve	603186			

A	ir Consu	ımptio	n					
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Figures are based on theoretical data

AT A GLANCE:

11 7/8" - 17 1/2"

SIZE _______

SHANK

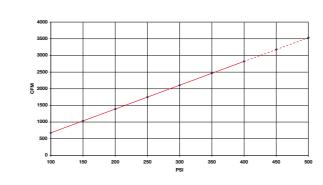
SD12

AIR PRESSURE 100 - 435 psi (7 - 30 bar)

Hammer Overview	
Hammer Model	Mach 120
Part Number	600108
Shank	SD12
Thread connection	6 5/8" API Reg Pin
Minimum bit diameter	300 MM
Hammer flat size	C Ring type
Weight	614 Kg (1,353 lbs)
Outside diameter	273mm (10.75")
Length (shoulder to shoulder)	1667mm (65.6")
Minimum weight on bit	1600 Kg (3520 lbs)
Maximum weight on bit	3500 Kg (7700 lbs)

Parts List					
Hammer type	Mach 120		Mainte	enance	
Shank	SD12		Kits		
Part number	600108		Service Kit	Repair Kit	
Item	Description	Part No.	SK12	RK19	
1	Thread Protector	200112			
2	Circlip	777001	1		
3	O-Ring	768133	1		
4	N.R.V. Seat	602286			
5	Non Return Valve	602288			
6	N.R.V. Spring	760055	1		
7	Top Adaptor	602639			
8 & 9	O-Ring	768137	2		
10	Spacer	602366			
11	Cylinder	602013			
12	Piston	602047			
13	Snap Ring	783021	1		
14	O-Ring	768105	1		
15	Bit Retaining Ring	602102			
16	Chuck Spacer	602366	1		
17	Chuck	602052			
	Foot Valve	601811			

Air Consumption

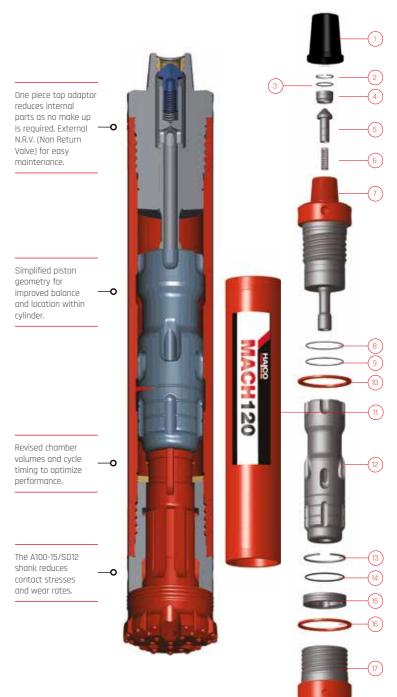


Mach 120

Mach 120 has a working pressure range of 170-350 psi (12-24bar) whilst its optimum performance is reached at air pressures of 200psi (14 Bar) and above.

12" Mach 120

Mach120 has no liner which increases the 140kg piston's blow energy and reduces parts required.



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YOUR DRILLING EXPERT

Hammers

12" Mach 132

12" Mach 122

Mach 122

The Mach 122 accepts A100-15 (SD12) shank bits and works over a wide pressure range with an optimum performance reached at air pressures of 200 psi (14 bar) and above as its higher air consumption provides increased uphole velocity, particularly when using oversized diameter drill bits.

Mach 122 has a one piece top-adaptor with N.R.V. (Non-Return-Valve) fitted for easy inspection and service, with integral finger to reduce maintenance and eliminate shimming which increases service intervals. Mach 122 has no liner which increases the 140 kg piston blow energy and reduces parts required. This hammer is suitable for use with overburden systems.



Simplified piston geometry for improved balance —o and location within cylinder.

Revised chamber volumes and cycle —o timing to optimize

The A100-15/SD12 shank reduces contact stresses and wear rates.

AT A GLANCE:

SIZE

11 7/8" - 17 1/2"

Length (shoulder to shoulder)

Minimum weight on bit Maximum weight on bit

 \bigcirc SHANK 300mm - 445mm



(7 - 30 bar)

1667mm (65.6") 1600 Kg (3520 lbs)

3500 Kg (7700 lbs)

Hammer Overview	
Hammer Model	Mach 122
Part Number	600110
Shank	SD12
Thread connection	6 5/8" API Reg Pin
Minimum bit diameter	300 MM
Hammer flat size	C Ring type
Weight	614 Kg (1,353 lbs)
Outside diameter	273mm (10.75")

Parts List					
Hammer type	Mach 122				
Shank	SD12				
Part number	600108		Service Kit	Repair Kit	
Item	Description	Part No.	SK12	RK19	
1	Thread Protector	200112			
2	Circlip	777001	1		
3	O-Ring	768133	1		
4	N.R.V. Seat	602286			
5	Non Return Valve	602288			
6	N.R.V. Spring	760055	1		
7	Top Adaptor	602639			
8 & 9	O-Ring	768137	2		
10	Spacer	602366			
11	Cylinder	602013			
12	Piston	602047			
13	Snap Ring	783021	1		
14	0-Ring	768105	1		
15	Bit Retaining Ring	602102			
16	Chuck Spacer	602366	1		
17	Chuck	602052			
	Foot Valve	601811			

4000				1	
3500					
3000					
2500					
2000		 			
1500		1			
1000					
500	_	_			

AT A GLANCE: SIZE SHANK **AIR PRESSURE** 381mm - 489mm 100 - 435 PSI DHD112 15 - 29 1/4" (7 - 30 bar)

Hammer Overview	
Hammer Model	Mach 132
Part Number	600142
Shank	DHD112 Pin Drive
Thread connection	6 5/8" API Reg Pin
Minimum bit diameter	381 MM
Hammer flat size	C Ring type
Weight	615 Kg (1,356 lbs)
Outside diameter	273mm (10.75")
Length (shoulder to shoulder)	1684mm (66.3")
Minimum weight on bit	1600 Kg (3520 lbs)
Maximum weight on bit	3500 Kg (7700 lbs)

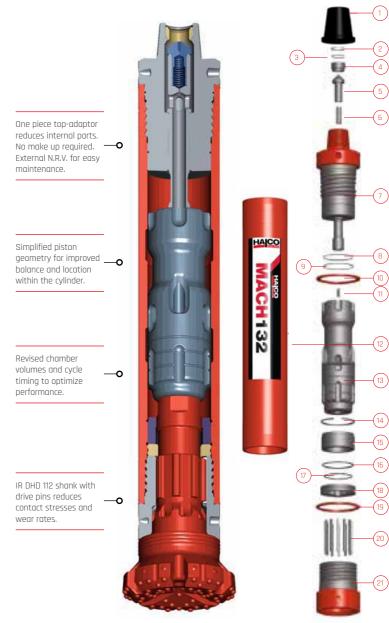
Hammer type Shank					
	Mach 132	Maintenance Kits			
SHUHK	DHD112 Pin Drive		Service Rep		
Part number	600142	600142			
Item	Description	Part No.	SK14	RK2	
1	Thread Protector	200112			
2	Circlip	777001	1		
3	O-Ring	768133	1		
4	N.R.V. Seat	602286			
5	Non Return Valve	602288			
6	N.R.V. Spring	760055	1		
7	Top Adaptor	602639			
8 & 9	O-Ring	768137	2		
10	Bleed Plug - Blank	602499			
	Bleed Plug - 3mm	602500			
	Bleed Plug - 4mm	602501			
	Bleed Plug - 5mm	602502			
	Bleed Plug - 6mm	602503			
	Bleed Plug - 8mm	602874			
11	Spacer	602366			
12	Cylinder	602563			
13	Piston	604503			
14	Snap Ring	783021	1		
15	Bit Guide Bush	602531			
16	O-Ring	768184	1		
17	Viton Band Containment	603819	1		
18	Bit Retaining Ring	602530			
19	Chuck Spacer	602366	1		
20	Drive Pin Set (8)	600564	1		
21	Chuck	602528			

4000					
3500					
3000				ار	
2500			<u> </u>		
E 2000					
1500					
1000					
500			-		

Mach 132

The Mach 132 hammer accepts IR DHD112 shank bits. This hammer, although capable of high pressure drilling is particularly suitable at pressures between 100 - 200 psi (7 - 14 bar).

The Mach 132 has a pin drive system to prevent metal to metal contact thereby minimizing spline wear and damage which can result in drill bit shank failure. Mach 132 has a one piece top-adaptor with N.R.V. (Non-Return-Valve) fitted for easy inspection and service, with integral finger to reduce maintenance and eliminate shimming which increases service intervals. Servicing requires only a few simple tools. Mach 132 has no liner which increases the 140 kg piston blow energy and reduces parts required. This hammer is suitable for use with overburden systems.



HAICO

www.halco.uk

YOUR DRILLING EXPERT

12" Superior 1200

Superior 1200

The Superior 1200 incorporates a unique piston design for high performance and reliability especially in Oil & Gas applications.

This hammer is suitable for a wide range of air pressures. Its optimum performance is reached at air pressures of 200psi (14 bar) and above. Standard design features include a jetted back head, a variable air bleed piston and a bit catcher system to ensure your bits are not lost down the hole and diamond enhanced inserts.

Variable bypass porting has been added to the

A variable live air bleed to allow greater additives to —o increase up-hole velocity.



The Bit Catcher System has a specially designed —o chuck and drill bit







381 - 660mm (15" - 19 1/4")

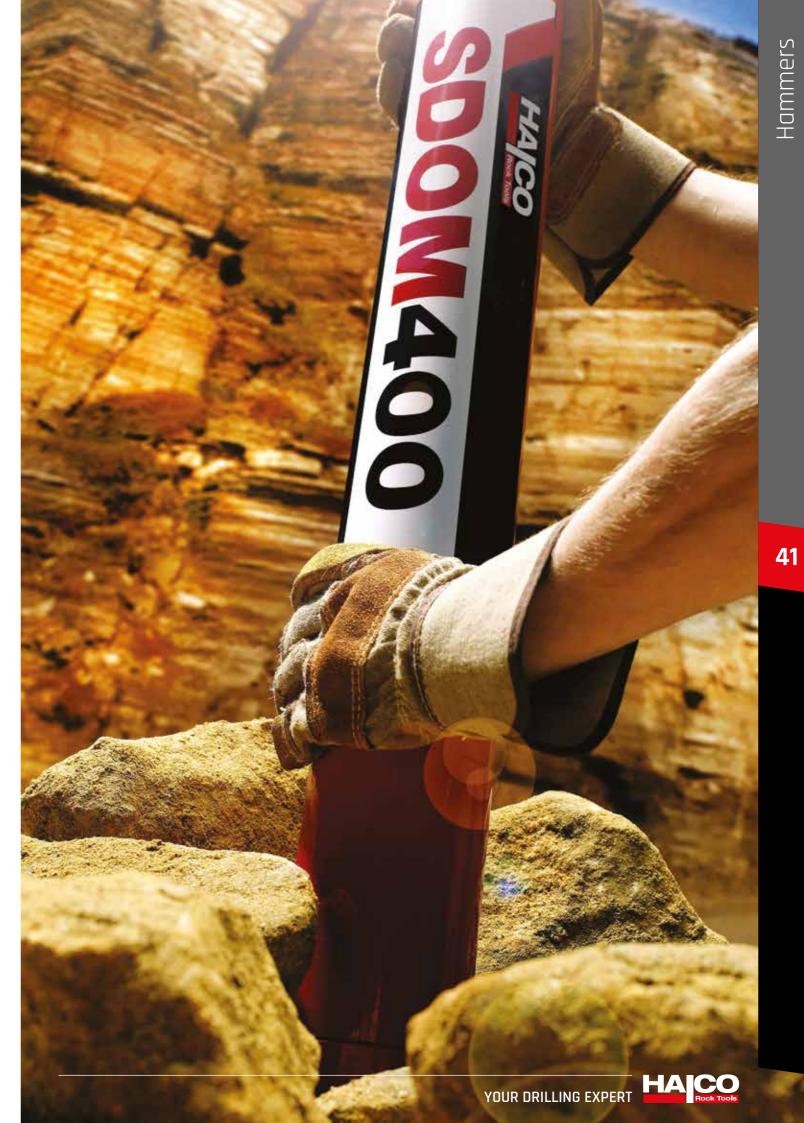
SHANK DHD112 AIR PRESSURE

100 - 435psi (7 - 30 bar)

Hammer Overview	
Hammer Model	Superior 1200 - Thrd ctch
Part Number	600435
Shank	DHD112 Pin Drive
Thread connection	6 5/8" API Reg Pin
Minimum bit diameter	381mm
Hammer flat size	C Ring type
Weight	615 Kg (1,356 lbs)
Outside diameter	273mm (10.75")
Length (shoulder to shoulder)	1684mm (66.3")
Minimum weight on bit	1600 Kg (3520 lbs)
Maximum weight on bit	3500 Kg (7700 lbs)

Maximum weigh	t on bit	3500 Kg (7700 lbs)			
Dorte Liet					
Parts List					
Hammer type	Superior 1200 - Thrd ctch				
Shank	DHD112 Pin Drive		Kits		
Part number	600435		Service Kit	Repai Kit	
Item	Description	Part No.	SK93	RK15	
1	Thread Protector	200112			
2	Circlip	777001	1		
3	O-Ring	768133	1		
4	N.R.V. Seat	602286			
5	Non Return Valve	602288			
6	N.R.V. Spring	760055	1		
7	Top Adaptor	605000			
8&9	O-Ring	768137	2	2	
10	Bleed Plug - Blank	602499			
	Bleed Plug - 3mm	602500			
	Bleed Plug - 4mm	602501			
	Bleed Plug - 5mm	602502			
	Bleed Plug - 6mm	602503			
	Bleed Plug - 8mm	602874			
11	Spacer	602366			
12	Cylinder	604875			
13	Piston	604503			
14	Snap Ring	783021	1		
15	Bit Guide Bush	602531			
16	0-Ring	768184	1		
	Viton Band Containment	603819	1		
17	Bit Retaining Ring	602530			
18	Drive Pin Set (8)	600564	1		
19	Bit Catcher Chuck	604727			
20	Threaded Catcher				
	Foot Valve	602522			
Air Consum					

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1000	-							- NO PLUS

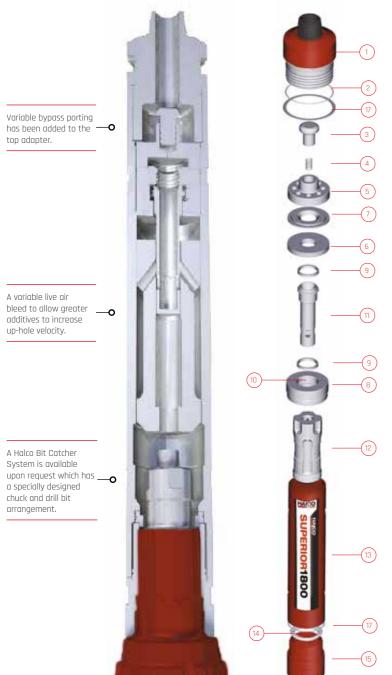


18" Superior 1800

Superior 1800

The Superior 1800 has been designed for high performance drilling in medium to hard rock conditions. Design features include a jetted back head and a variable air bleed piston to enable greater up hole velocity.

The Superior 1800 has a drive pin arrangement to prevent metal to metal contact, thereby minimising spline wear and damage, which can result in a drill bit shank failure.



AT A GLANCE:



SHANK



457 - 660mm 18 - 26"

NUMA180, SD-18

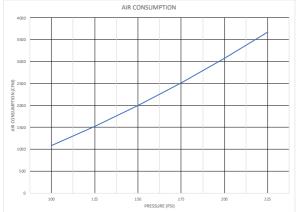
QL 200

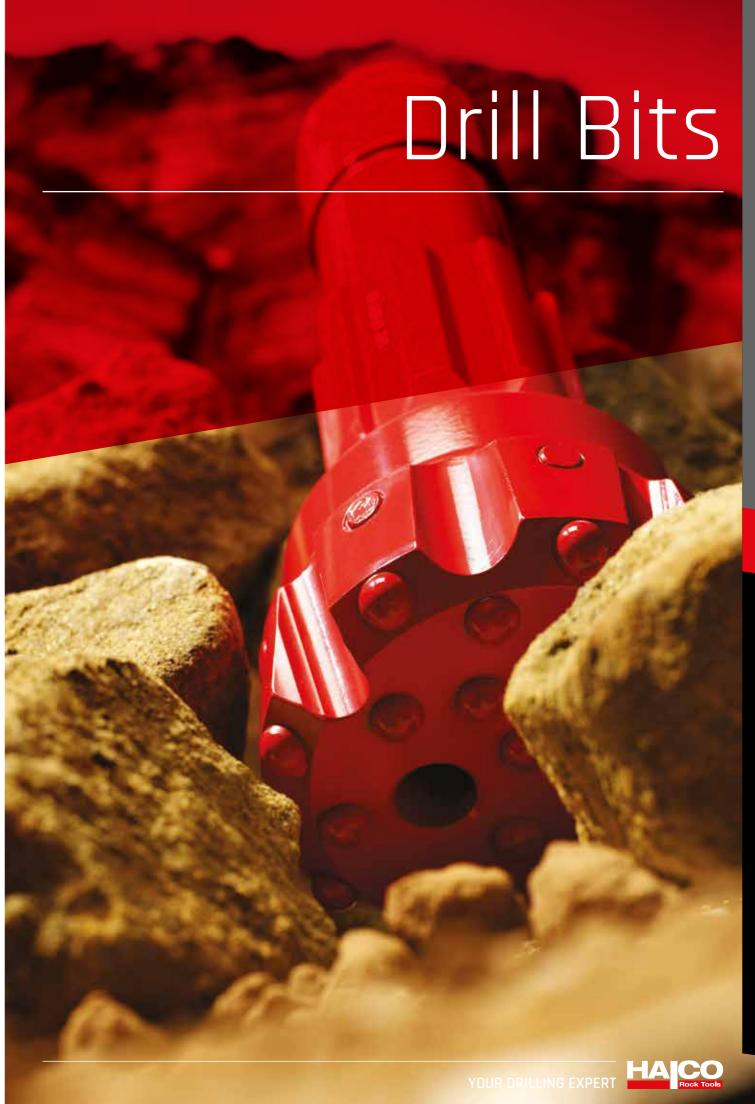
AllX	MEG	TC II
100	- 435	psi
(7 -	30 p	ar)

Hammer Overview	
Hammer Model	Superior 1800
Part Number	600191
Shank	NUMA 180
Thread connection	8 5/8" API Reg Pin
Minimum bit diameter	
Hammer flat size	C Ring type
Weight	1600 Kg
Outside diameter	410mm (16.14")
Length (shoulder to shoulder)	1930mm (75.98")
Minimum weight on bit	1600 Kg (3520 lbs)
Maximum weight on bit	3500 Kg (7700 lbs)

Parts List				
Hammer type	Superior 1800		Mainte	enance
Shank	NUMA 180			
Part number	600191		Service Kit	Repair Kit
Item	Description	Part No.	SK98	RK155
1	Top Adaptor 8-5/8" Pin	605060		
2	Top Adaptor 'O' Ring	768224	1	1
3	Check Valve	605047		1
4	Check Valve Spring	760164	1	1
5	Valve Chest	605048		
6	Compression Buffer	605049		1
7	Buffer Cover	605050		
8	Tube Holder	605051		
9	Tube Buffers (2)	605052		2
10	Tube 'O' Ring	768225	1	1
11	Control Tube	605053		
12	Piston	605054		
13	Cylinder	605055		
14	Bit Retaining Ring	605056		1
15	Chuck	605057		1
16	Chuck Bearing	605058	1	1
17	Breakout Washer	605059	1	1

Air Consumption





Selection Guide

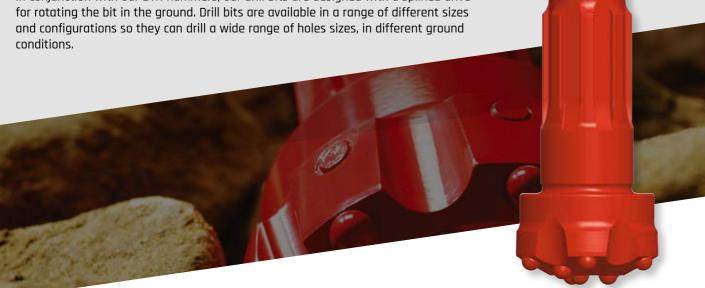
Bit

Drill Bit Overview

What are 'Down-the-Hole' (DTH) Drill Bits and how are they used?

Down-the-hole drill bits are used with down-the-hole hammers for drilling holes through a wide range of rock types.

In conjunction with our DTH hammers, our drill bits are designed with a splined drive



How have DTH Drill Bits developed?

Rapid advances in drill bit technology have occurred throughout the last 40 years. The first type of drill bits used with down-the-hole hammers were 'cross bit' design. Four chisel shaped lengths of tungsten carbide were brazed creating stresses within the drill bit thereby limiting its life. A further disadvantage of the cross bit design was that the majority of the carbide was situated around the centre of the bit face and not towards the outer edge of the drill bit where there is the most rock to cut.

In the late 1960s however, the button bit was introduced: this was a landmark in the progress of DTH equipment, which led to bit lives previously unheard of.

Cylindrical button inserts were precision ground to extremely close tolerances and pressed into the bit as an interference fit. This resulted in improved carbide insert retention by eliminating brazing stresses and other defects associated with brazing and braze materials.

Buttons inserts are distributed more efficiently than cross bit inserts by providing more cutting power where it is needed at the outer edge of the drill bit face.

In many cases, the need to sharpen the drill bit was eliminated with the arrival of the button bit and the improved cutting action provided While the cross bit design is still used in some rotary and drifted applications where the rock is very soft, the button bit is now used in virtually every DTH application.

Applications for Overburden Systems

Soft soil is normally drilled with augers or by the rotary method but DTH hammers have been adapted to handle soft conditions by being able to drill and case a hole simultaneously by using a concentric bit, which can be withdrawn on completion of the bore hole: leaving the casing in situ, thus preventing hole collapse.

"We guarantee to have a drill bit that can tackle any challenge."

Drill Bit Selection Guide

As with all Halco hammers it is crucial that you choose the right drill bit otherwise it will cost you both in time and money. We pride ourselves on having a comprehensive range of drill bits on offer so you can be sure that you will definitely find a suitable bit for any project you are undertaking.

Our carburised drill bit are among the best in the world providing outstanding performance and durability.

We produce all our drill bits at our specialised plant where they are made out of high quality nickel chrome alloy steel, carburised and heat-treated to offer extra protection against wear and fatigue. Every hole in the bit head is machined to within microns and fitted with carbide inserts which provide the cutting action of the rock.

We have three different bit heads on offer, Flat Face, Concave and Convex, which are available with three different inserts. We guarantee that we have a drill bit that can tackle any challenge and rock face formation. The two most important factors in choosing the right drill bit are productivity and reliability.

For soft to medium rock formations where penetration rates are high, the ballistic and semi-ballistic inserts coupled with flat face or concave bit heads are more suitable.





Flat Face

Alternative design for all rock conditions especially fractured and fissured rock and changing formations.



Ballistic Inserts

Suitable for soft and medium compact low abrasive rocks producing large cuttings.



Concave

Alternative design for all rock conditions particularly deep hole drilling can improve hole alignment as a result of inverted pilot.



Domed Inserts

Strong rugged shape for high performance and good service life in all conditions particularly suitable for very hard abrasive rocks and deep hole drilling.



Convex

Strong design for all conditions especially hard abrasive rock. Good balance of fast drilling and long service life.



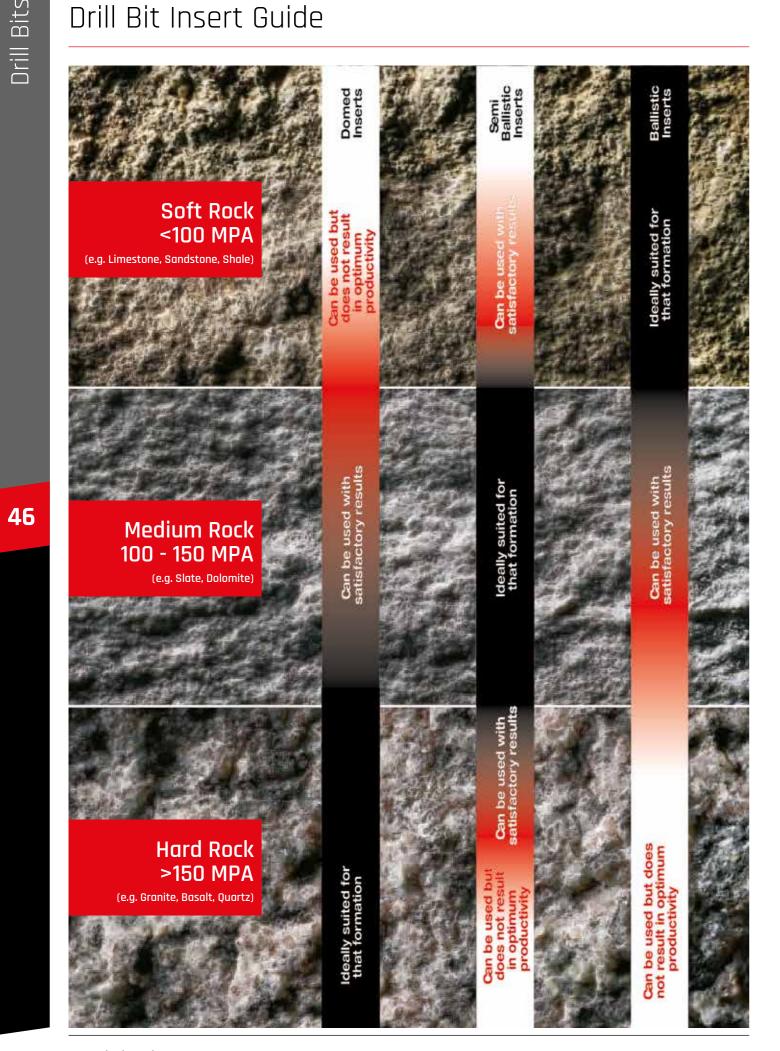
Inserts

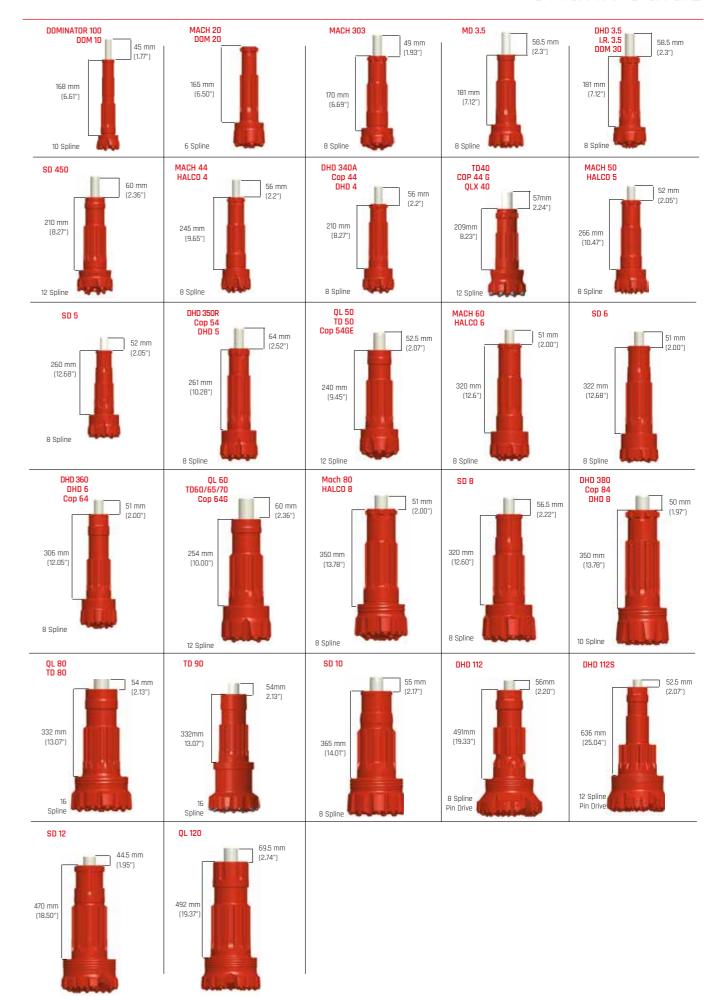
Suitable for all soft and medium rock conditions including fractured and fissured rock.



Shank Guide

Shank Guide

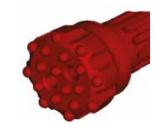




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Orill Bits

1" Halco 1



Flat Fac	e						
Part Number	Dia mm	meter Inches	Face design	Button shape	Flushing holes	Gauge carbide diameter & Qty	Face carbide diameter & Qty
650017	55	2	Flat Face	Domed	2	11mm (6)	9mm (2)
650032	64	2 1/2	Flat Face	Domed	2	11mm (6)	9mm (2)
653001	64	2 1/2	Flat Face	Semi-Ballistic	2	11mm (6)	9mm (3)

2" Halco 2



Flat Face	2						
Part Number	Dia:	meter Inches	Face design	Button shape	Flushing holes	Gauge carbide diameter & Qty	Face carbide diameter & Qty
650952	70	2 3/4	Flat Face	Domed	2	11mm (6)	9mm (4)
650953	76	3	Flat Face	Domed	2	11mm (6)	9mm (5)
650954	76	3	Flat Face	Ballistic	2	11mm (6)	9mm (5)

3" IR3.5



Convex							
Part	Diar	meter	Face	Button	Flushing holes	Gauge carbide	Face carbide
Number	mm	Inches	design	shape	riasiling noics	diameter & Qty	& Qty
650622	90	3 1/2	Convex	Semi Ballistic	2	11mm (6)	11mm (7)
650623	90	3 1/2	Convex	Domed	2	11mm (6)	11mm (7)
650609	95	3 3/4	Convex	Semi Ballistic	2	11mm (8)	11mm (7)
650621	100	4	Convex	Domed	2	11mm (8)	11mm (7)
650610	100	4	Convex	Semi Ballistic	2	11mm (8)	11mm (7)
650624	104	4 1/10	Convex	Domed	2	13mm (8)	11mm (8)

3" MD3.5

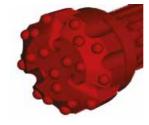


Convex								
Part	Diameter		Face	Button	Flushing holes	Gauge carbide	Face carbide diameter	
Number	mm	Inches	design	shape		diameter & Qty	& Qty	
653354	95	3 3/4"	Convex	Semi Ballistic	2	14mm (6)	14mm (5)	
653628	105	4 1/4	Convex	Ballistic	2	11mm (10)	11mm (3)	



Flat Face	2						
Part Number	Diar mm	neter Inches	Face design	Button shape	Flushing holes	Gauge carbide diameter & Qty	Face carbide diameter & Qty
653384	95	3 3/4	Flat Face	Domed	2	14mm (6)	14mm (5)
653349	100	4	Flat Face	Domed	2	11mm (8)	11mm (8)

4" DHD340 Bits



Convex								
Part Number	Dia	meter	Face design	Oversize Bit	Button shape	Flushing holes	Gauge carbide diameter & Oty	Face carbide diameter & Oty
Nullibei	mm	Inches	uesigii	ыс	Silupe	110163	didiffecer & Qty	ulumeter & Qty
650968	108		Convex		Semi Ballistic	2	13mm (12)	12mm (3)
653091	110	4 5/16	Convex		Parabolic	2	14mm (8)	14mm (6)
650526	115	4 1/2	Convex		Parabolic	2	13mm (12)	13mm (4)
650967	115	4 1/2	Convex		Parabolic	2	13mm (12)	13mm (4)
653482	127	5	Convex	~	Ballistic	3	13mm (15)	13mm (5)
653094	140	5 1/2	Concave	•	Domed	3	16mm (9)	14mm (9)
653683	150	5 7/8	Convex	•	Domed	2	13mm (12)	13mm (5)
653682	150	5 7/8	Convex	~	Ballistic	2	13mm (12)	13mm (5)

Note * Oversize sold without warranty



Flat Fac	е							
Part Number	Dia mm	meter Inches	Face design	Oversize Bit	Button shape	Flushing holes	Gauge carbide diameter & Qty	Face carbide diameter & Qty
650955	115	4 1/2	Flat Face		Domed	2	14mm (8)	13mm (10)
653623	115	4 1/2	Flat Face		Domed	2	16mm (8)	13mm (6)
650965	130	5 1/8	Flat Face	~	Domed	2	14mm (8)	14mm (10)

Note * Oversize sold without warranty



Concave	!							
Part	Dia	meter	Face	Oversize	Button	Flushing	Gauge carbide	Face carbide
Number	mm	Inches	design	Bit	shape	holes	diameter & Qty	diameter & Qty
650625	115	4 1/2	Concave		Domed	2	14mm (8)	13mm (6) DWB
650680	120	4 3/4	Concave		Domed	2	13mm (8)	13mm (6) DWB
653094*	140	5 1/2	Concave	~	Domed	3	16mm (9)	14mm (9)

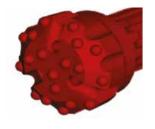
Note * Oversize sold without warranty



Orill Bits

5" QL50 Bits

4" Halco 4.5 Bits



Convex								
Part	Diar	meter	Face	Oversize	Button	Flushing	Gauge carbide	Face carbide diameter
Number	mm	Inches	design	Bit	shape	holes	diameter & Qty	& Qty
653223	110	4 5/16	Convex		Domed	2	14mm (8)	14mm (6)
653217	110	4 1/3	Convex		Ballistic	2	14mm (7)	14mm (7)
653224	115	4 1/2	Convex		Domed	2	14mm (8)	14mm (7)
653209	115	4 1/2	Convex		Ballistic	2	14mm (8)	14mm (7)
653197	127	5	Convex	~	Ballistic	2	14mm (9)	14mm (9)

Note * Oversize sold without warranty



Flat Fac	е							
Part Number	Diar mm	meter Inches	Face design	Oversize Bit	Button shape	Flushing holes	Gauge carbide diameter & Qty	Face carbide diameter & Qty
653230	115	4 1/2	Flat Face		Domed	2	14mm (8)	13mm (10)
653650	127	5	Flat Face	~	Domed	2	16mm (8)	13mm (8)

Note * Oversize sold without warranty



Concave	:							
Part Number	Diar mm	meter Inches	Face design	Oversize Bit	Button shape	Flushing holes	Gauge carbide diameter & Qty	Face carbide diameter & Qty
653268	127	5	Concave	~	Domed	2	14mm (8)	13mm (8)

Note * Oversize sold without warranty

4" Halco 4 Bits



Convex								
Part Number	Diameter		Face design	Oversize Bit	Button shape	Flushing holes	Gauge carbide diameter & Oty	Face carbide diameter
Nullibei	mm	Inches	uesigii	ыс	Silupe	Holes	ulullietei & Qty	& Qty
650931	110	4 5/16	Convex		Domed	2	13mm (12)	13mm (3)
650932	115	4 1/2	Convex		Domed	2	14mm (8)	13mm (8)
650933	120	4 3/4	Convex		Domed	2	14mm (8)	13mm (8)
650466	127	5	Convex	•	Domed	2	13mm (12)	13mm (4)
650444	140	5 1/2	Convex	~	Domed	2	13mm (12)	13mm (5)
650445	150	5 7/8	Convex	~	Domed	2	13mm (12)	18mm (5)

Note * Oversize sold without warranty



Concave	!						
Part Number	Dia:	meter Inches	Face design	Button shape	Flushing holes	Gauge carbide diameter & Qty	Face carbide diameter & Qty
650925	127	5	Concave	Semi Ballistic	2	13mm (8)	13mm (8)

Note * Oversize sold without warranty



Convex							
Part Number	Dian mm	neter Inches	Face design	Button shape	Flushing holes	Gauge carbide diameter & Qty	Face carbide diameter & Qty
653238	130	5 1/8	Convex	Ballistic	3	14mm (9)	14mm (9)
653593	140	5 1/2	Convex	D/B	3	14mm (9)	14mm (9)



Flat Face	2						
Part Number	Diar mm	Diameter Face nm Inches design		Button shape	Flushing holes	ng holes Gauge carbide Face co diameter & Qty diamete	
653235	140	5 1/2	Flat Face	Domed	2	16mm (8)	16mm (8)LGD



Concave								
Part Number	Dian mm	neter Inches	Face design	Oversize Bit	Button shape	Flushing holes	Gauge carbide diameter & Qty	Face carbide diameter & Qty
670249	140	5 1/2	Concave		Domed	2	16mm (8)	16mm (7)
670250	146	5 3/4	Concave		Domed	2	16mm (8)	16mm (8)
653639	152	6	Concave	~	Domed	3	16mm (15)	14mm (5)
670700	152	6	Concave	~	Domed	2	16mm (8)	16mm (8)
653715	165	6 1/2	Concave	~	Domed	3	16mm (15)	14mm (6)

Note * Oversize sold without warranty



5" DHD350 Bits

5" Halco 5 Bits

Orill Bits

53



Convex							
Part Number	Dia mm	meter Inches	Face design	Button shape	Flushing holes	Gauge carbide diameter & Qty	Face carbide diameter & Qty
653070	140	5 1/2	Convex	SB	2	16mm (8)	16mm (8)
650711	152	6	Convex	Domed	2	16mm (15)	16mm (5)



Flat Face	2						
Part Number	Dic mm	ameter Inches	Face design	Button shape	Flushing holes	Gauge carbide diameter & Qty	Face carbide diameter & Qty
653205	140	5 1/2	Flat Face	Domed	2	16mm (8)	16mm (8)

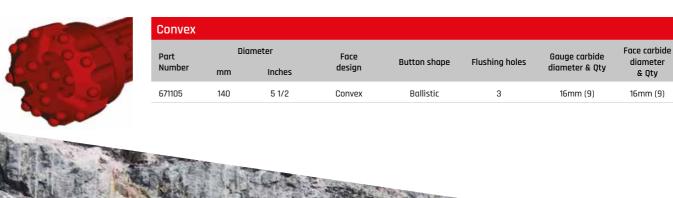


Concave							
Part	Dia	meter	Face	Button shape	Flushing holes	Gauge carbide	Face carbide diameter
Number	mm	Inches	design	button shape	riusiling noies	diameter & Qty	& Qty
670037	140	5 1/2	Concave	Domed	2	16mm (8)	16 mm (7)
670040	146	5 3/4	Concave	Domed	2	16 mm (8)	16 mm (7)
EESUUS	166	E 1/2	concavo	domod	2	20mm (0)	15mm (10)



art Diameter		Face	Oversize	Button	Eluching holos	Gauge carbide	Face carbide	
mm	Inches	design	Bit	shape	riusiling noies	diameter & Qty	diameter & Qty	
127	5	Convex		Domed	2	13mm (10)	13mm (3)	
127	5	Convex		Domed	2	11mm (12)	11mm (6)	
140	5 1/2	Convex		Domed	2	16mm (11)	16mm (3)	
150	5 7/8	Convex		Domed	2	16mm (11)	16mm (3)	
165	6 1/2	Convex	•	Domed	2	16mm (12)	16mm (4)	
	mm 127 127 140 150	mm Inches 127 5 127 5 140 5 1/2 150 5 7/8	mm Inches Face design 127 5 Convex 127 5 Convex 140 5 1/2 Convex 150 5 7/8 Convex	mm Inches Face design Oversize Bit 127 5 Convex 127 5 Convex 140 5 1/2 Convex 150 5 7/8 Convex	mm Inches Face design Oversize Bitton shape Bit Button shape 127 5 Convex Domed 127 5 Convex Domed 140 5 1/2 Convex Domed 150 5 7/8 Convex Domed	mm Inches design Bit Shape Flushing holes 127 5 Convex Domed 2 127 5 Convex Domed 2 140 51/2 Convex Domed 2 150 57/8 Convex Domed 2	mm Inches Face design Oversize Bit Button shape Flushing holes Gauge carbide diameter & Qty 127 5 Convex Domed 2 13mm (10) 127 5 Convex Domed 2 11mm (12) 140 5 1/2 Convex Domed 2 16mm (11) 150 5 7/8 Convex Domed 2 16mm (11)	

5" Mission 50 Bits

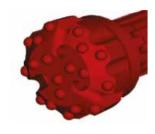






Orill Bits

6" QL60 Bits



Convex							
Part Number	Diar mm	neter Inches	Face design	Button shape	Flushing holes	Gauge carbide diameter & Qty	Face carbide diameter & Qty
653651	171	6 3/4	Convex	Parabolic	3	18mm (13)	18mm (6)



Flat Face	2						
Part Number	Diar mm	neter Inches	Face design	Button shape	Flushing holes	Gauge carbide diameter & Qty	Face carbide diameter & Qty
653352	165	6 1/2	Flat Face	Domed	2	18mm (10)	18mm (12)
653553	171	6 3/4	Flat Face	Domed	2	18mm (10)	18mm (12)



Concave							
Part Number	Diar	neter	Face design	Button shape	Flushing holes	Gauge carbide diameter & Qty	Face carbide diameter & Oty
Nullibei	mm	Inches	uesiyii	Sliupe		ulullietei & Qty	ulullietei & Qty
670210	150	6	Concave	Domed	2	16mm (12)	16mm (4)
671131	155	6	Concave	Domed	2	16mm (8)	16mm (8)
670334	159	6 1/4	Concave	Domed			
670208	165	6 1/2	Concave	Domed	2	19mm (8)	16mm (8)
670216	165	6 1/2	Concave	Domed	2	16mm (8)	16mm (8)
670582	165	6 1/2	Concave	Domed	2	16mm (10)	16mm (9)
670592	171	6 3/4	Concave	Domed	3	19mm (9)	16mm (11)
670718	171	6 3/4	Concave	Domed	3	19mm (9)	16mm (11)
670449	171	6 3/4	CC CV	Domed	2		
653118	171	6 3/4	Concave	Domed	2	16mm (8)	16mm (10)
670665	178	7	Concave	Domed	3	16mm (9)	16mm (11)
653128	178	7	Concave	Domed	2	20mm (8)	16mm (11)
670722	190	7 1/2	Concave	Domed	2	16mm (10)	16mm (14)
653227	190	7 1/2	Concave	Domed	2	16mm (10)	16mm (14)
671064	200	7 7/8	Concave	Domed	3	19mm (9)	16mm (18)
670220	203	8	Concave	Domed	2	16mm (10)	16mm (13)

Note * Oversize sold without warranty



Convex							
Part Number	Dia mm	meter Inches	Face design	Button shape	Flushing holes	Gauge carbide diameter & Qty	Face carbide diameter & Qty
650783	152	6	Convex	Domed	2	16mm (15)	16mm (5)
650795	165	6 1/2"	Convex	Domed	2	16mm (15)	16mm (5)

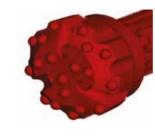


Concave								
Part Number	Diameter mm Inches		Face design	Oversize Bits	Button shape	Flushing holes	Gauge carbide diameter & Qty	Face carbide diameter & Qty
670076	150	6	Concave		Domed	2	16mm (8)	16mm (8)
650783	152	6	Concave		Domed	2	16mm (15)	16mm (5)
670088	165	6 1/2	Concave		Domed	3	16mm (8)	16mm (8)
650789	165	6 1/2	Concave		Domed	2	16mm (8)	16mm (10)
653038	170	6 2/3	Concave		Domed	2	16mm (8)	16mm (10)
653097	180	7	Concave	~	Domed	2	16mm (8)	16mm (10)
653098	190	7 1/2	Concave	~	Domed	2	16mm (10)	16mm (14)

Note * Oversize sold without shank warranty

6" Halco 6

6" DHD360 Bits



Convex								
Part	Diameter		Face	Oversize	Button	Flushing	Gauge carbide	Face carbide
Number	mm	Inches	design	Bits	shape	holes	diameter & Qty	diameter & Qty
650585	152	6	Convex		Domed	2	16mm (12)	16mm (4)
650440	200	7 7/8	Convex	•	Domed	3	16mm (12)	16mm (8)
650441	225	8 6/7	Convex	•	Domed	3	16mm (15)	16mm (11)
650457	245	9 5/8	Convex	~	Domed	3	16mm (15)	16mm (12)

Note * Oversize sold without warranty



Flat Face	2							
Part Number	Dia mm	meter Inches	Face design	Oversize Bits	Button shape	Flushing holes	Gauge carbide diameter & Qty	Face carbide diameter & Qty
650354	191	7 1/2	Flat Face	•	Domed	3	16mm (13)	16mm (8)



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8" DHD380 Bits

Orill Bits

57

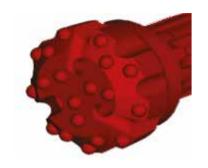


Flat Face	2						
Part Number	Dian mm	neter Inches	Face design	Button shape	Flushing holes	Gauge carbide diameter & Qty	Face carbide diameter & Qty
653490	203		Flat Face	Domed	2	18mm (10)	18mm (16)



Concave							
Part	Part Diamet		Face	Button	Flushing	Gauge carbide	Face carbide
Number	mm	Inches	design	shape	holes	diameter & Qty	diameter & Qty
653379	203	8	Concave	Domed	2	18mm (10)	18mm (14)
670415		8	Concave	Domed	2	19mm (10)	16mm (14)
671097	222	8 3/4	Concave	Domed	2	18mm (10)	18mm (16)
671116	225	8 7/8	Concave	Domed	3	18mm (9)	18mm (9)
670763	225	8 7/8	Concave	Domed		19mm (10)	19mm (8) 16mm (8)
653711	229	9	Concave	Domed	3	18mm (27)	18mm (9)
671100	229	9	Concave	Domed	3	19mm (21)	16mm (9)
670763	251	9 7/8	Concave	Domed	2	19mm (18)	16mm (8)

8" Halco 8



Convex								
Part	Dian	neter	Face	Oversize	Button	Flushing	Gauge carbide	Face carbide diameter
Number	mm	Inches	design	Bits	shape	holes	diameter & Qty	& Qty
650571	225		Convex		Domed	3	16mm (16)	16mm (10)
650746	254	10	Convex	•	Domed	2	20mm (15)	20mm (5)
653510	290		Convex	•	Domed	4	16mm (20)	16mm (18)
650365	311	12 1/4	Convex	~	Domed	3	20mm (18)	20mm (11)

Note * Oversize sold without warranty



Flat Fac	e							
Part Number	Dia mm	meter Inches	Face design	Oversize Bits	Button shape	Flushing holes	Gauge carbide diameter & Qty	Face carbide diameter & Qty
650898	300	11 4/5	FLAT FACE	•	DOMED	2	20mm (22)	20mm (12)

Note * Oversize sold without warranty



Part	Dia	meter	Face	Oversize	Button	Flushing	Gauge carbide	Face carbide
Number	mm	Inches	design	Bits	shape	holes	diameter & Qty	diameter & Qty
650977	200	77/8	Concave		Domed	2	16mm (14)	20mm (10)
650373	203	8	Concave		Domed	2	20mm (10)	16mm (14)
650074	216	8 1/2	Concave		Domed	3	13mm (9)	20mm (20)
670437	222	8.3/4	Concave		Domed	2	19mm (14)	19mm (5)
650022	241	9 1/2	Concave		Domed	2	20mm (18)	16mm (10)
650389	254	10.0	Concave		Domed	2	20mm (18)	16mm (11)
653041	311	12 1/4	Concave	~	Domed	2	20mm (22)	20mm (20)

Note * Oversize sold without warranty

10" SD-10 Bits



Concave	2							
Part	Diar	meter	Face	Oversize	Button	Flushing holes	Gauge carbide	Face carbide
Number	mm	Inches	design	Bits	shape	riasiling noics	diameter & Qty	diameter & Qty
650648	254	10	Concave		Domed	2	20mm (10)	20mm (8) 16mm (11)
650650	305	12	Concave		Domed	3	20mm (21)	20mm (13)
650071	311	12.1/4	Concave	~	Domed	2	20mm (22)	20mm (24)
650072	381	15	Concave	•	Domed	3	20mm (27)	20mm (38)

Note * Oversize sold without warranty

12" DHD112 Bits



Extende	d Head	bit catch	er Concave				
Part Number	Diar mm	neter Inches	Face design	Button shape	Flushing holes	Gauge carbide diameter & Qty	Face carbide diameter & Qty
653631	381	15	Concave	Domed	3	20mm (36)	18mm (24)
653704	422	16 5/8	Concave	Domed	3	20mm (61)	16mm (15)
653552	444	17 1/2	Concave	Domed	3	22.2mm (48)	18mm (18)

YOUR DRILLING EXPERT

HAICO
ROCK TOOLS

Shock Absorbers

12" SD-12 Bits

Shock Absorbers 2 - 6"



Concave	!						
Part Number	Dio mm	imeter Inches	Face design	Button shape	Flushing holes	Gauge carbide diameter & Qty	Face carbide diameter & Qty
650383	311	12 1/4	Concave	Domed	3	20mm (21)	20mm (10)
650376	445	17 1/2	Concave	Domed	3	20mm (48)	20mm (31)

18" NUMA 180 Bits



Flat Fac	e						
Part Number	Dia mm	meter Inches	Face design	Button shape	Flushing holes	Gauge carbide diameter & Qty	Face carbide diameter & Qty
653762	660	26''	Flat Face	Domed	3	20mm (42)	20mm (89)





Size	2"	3"	4"	5"	6"
Complete Shock Absorber	600688	600689	600690	600691	600692
Effective Length (Shoulder to Shoulder)	346mm (13.62")	457mm (17.93")	483mm (19.02")	514mm (20.27")	578mm (22.76")
Outside Diameter	62mm (2.44")	79.4mm (3.13")	95.4mm (3.76")	115mm (4.54")	140mm (5.51")
Thread Connection	50mm DIN405	2 3/8" API Reg	2 3/8" API Reg	3 1/2" API Reg	3 1/2" API Reg
Net Weight	7.5kg (16.5lb)	14.3kg (31.5lb)	22.1kg (48.7lb)	33.2kg (73.2lb)	53.0kg (116.8lb)

Shock Absorbers 8 - 10"



Size	8"	10"
Complete Shock Absorber	600693	600694
Effective Length (Shoulder to Shoulder)	585mm (23")	635mm (25")
Outside Diameter	178mm (7")	216mm (8.5")
Thread Connection	4 1/2" API Reg	6 5/8" API Reg
Net Weight	84kg (185.2lb)	98kg (216.1lb)

Shock Absorber 12"



Size	12"
Complete Shock Absorber	600695
Effective Length (Shoulder to Shoulder)	724mm (28.5")
Outside Diameter	254mm (10")
Thread Connection	6 5/8" API Reg
Net Weight	215kg (474lb)



Halco's eccentric Sim-Cas system is still one of the most cost effective solutions for casing installation when drilling in difficult ground conditions. The eccentric system negates the need to leave expensive ring bits in the hole when installing permanent casing.

The updated Sim-CasX solution has several benefits over its predecessor while retaining Halco's renowned product quality:

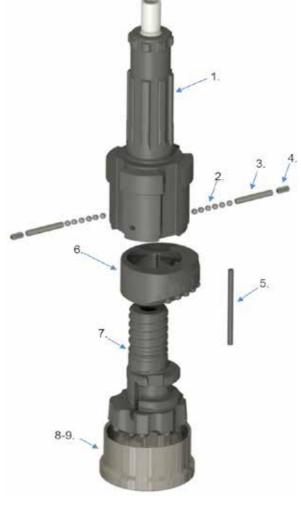
- Two piece pilot and reamer, allowing high wear reamers to be
- · Larger Pilot bit so the Reamer does less work resulting in longer reamer life
- · Stronger Pilot bit shaft for better impact energy
- · Internal drive lug with pressurised cleaning channels, ensures the reamer is always in the correct drilling position
- Ball bearing retaining system to ensure nothing comes adrift down the hole



Size	Shank	Pilot Bit diameter	Reaming diameter	Maximum Casing OD	Minimum Casing ID
Sim-CasX 90	DHD 3.5	90	123	115	102
Sim-CasX 115	DHD 340	115.8	151.2	142	128
Sim-CasX 140	DHD 350	141.2	185.8	171	155.6
Sim-CasX 165	DHD 360	165.8	211.2	195.6	182.5
Sim-CasX 190	DHD 360	190.8	236.2	222	205
Sim-CasX 240	DHD 380	240.8	308	273	260.4

System Size	90	115	140	165	190	240
Shank	DHD 3.5	DHD340	DHD350	DHD360	DHD360	DHD380
Pilot Bit diameter mm	90.0	115.8	141.2	165.8	190.8	240.8
Reaming diameter mm	123.0	151.2	185.8	211.2	236.2	308.0
Maximum Casing OD mm	115.0	142.0	171.0	195.6	222.0	273.0
Minimum casing ID mm	102.0	128.0	155.6	182.5	205.0	260.4
Casing thickness for thick wall shoe mm	6.0	5.6	5,6	5.6	6.3	6.3
Casing thickness for thin wall Shoe mm	4.5	4.5	4.5	4.5	5.0	

System Size	90	115	140	165	190	240
Sim-CasX System	651041	651040	651042	651043	651044	651045
1 - Guide Device	651046	651052	651058	651059	651069	651075
6 - Reamer	651048	651054	651060	651066	651071	651077
7 - Pilot Bit	651049	651055	651061	651067	651072	651078
8 - Casing Shoe - thick wall	651050	651056	651062	651073	651073	651079
9 - Casing Shoe - thin wall	651051	651057	651063	651074	651074	
Locking Kit	651047	651053	651059	651070	651070	651076
2 - Retaining balls						
3 - Solid locking pins						
4 - Spring Pins						
5 - Pusher Pin						





Notes

Conversion Table

Air Volume	Example
1 cc = .001 litre	1000cc = 1 litre
1 litre = .001 m ³	1000 litres = 1 m ³
THE 1551111	1000 11111
Air Flow	Example
1 cfm = 0.0283 m³/min	100 cfm = 2.83 m3/min
1 cfm = 0.4719 litre/sec	100 cfm = 47.19 litre/sec
1 m3/min = 35.315 cfm	10 m3/min = 353.15 cfm
1 m3/min = 16.667 litre/sec	10 m3/min = 166.67 litre/sec
1 litre/sec = 2.1189 cfm	100 litre/sec = 211.89 cfm
1 litre/sec = 0.0600 m³/min	100 litre/sec = 600 m³/min
Air Pressure	Example
1 psi = 0.0689 bar	100 psi = 6.89 bar
1 psi = 0.0703 kg/cm²	100 psi = 7.03 kg/cm ²
1 psi = 0.0680 atm (Atmosphere)	100 psi = 6.80 atm
1 bar = 14.504 psi	10 bar = 145.04 psi
1 bar = 1.0197 kg/cm²	10 bar = 10.197 kg/cm ²
1 bar = 0.9869 atm	10 bar = 9.869 atm
1 atm = 14.696 psi	10 atm = 146.96 psi
1 atm = 1.0132 bar	10 atm = 10.132 bar
1 atm = 1.0332 kg/cm²	10 atm = 10.332 kg/cm ²
Velocity	Example
1 m/min = 3.2808 ft/min	1000 m/min = 3280.80 ft/min
1 m/min = 0.0167 m/sec	1000 m/min = 16.70 m/sec
1 ft/min = 03048 m/min	1000 ft/min = 304.80 m/min
1 ft/min = 0.0051 m/sec	1000 ft/min = 5.10 m/sec
1 m/sec = 60.00 m/min	10 m/sec = 600 m/min
1 m/sec = 196.85 ft/min	10m/sec = 1968.50 ft/min
_	
Torque	Example
1 lb/ft = 0.1383 kgm	1000 lb/ft = 138.30 kgm
1 lb/ft = 1.3558 Nm	1000 lb/ft = 1355.80 Nm
1 lb/ft = 12.00 lb/in	1000 lb/ft = 12,000 lb/in
1 kgm = 7.233 lb/ft	100 kgm = 723.30 lb/ft
1 kgm = 9.8067 Nm	100 kgm = 980.67 Nm
1 kgm = 86.796 lb/in	100 kgm = 8679.60 lb/in
1 lb/in = 0.0833 lb/ft	1000 lb/min = 83.30 lb/ft
1 lb/in = 0.0115 kgm	1000 lb/in = 11.50 kgm
1 lb/in = 0.1130 Nm	1000 lb/in = 113 Nm



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