TECHNOLOGY FOR THE WELDER'S WORLD.



ABIMIG® A T LW RANGE

INTRODUCING THE FUTURE OF MIG WELDING

- Lightweight, very robust torches with proven technological advantages.
- Ergonomic design reduces operator physical strain/fatigue with subsequent improvement in productivity.
- Quick change swan necks with separate neck liners.
- Flexibility through modular concept for optimum accessibility in all welding positions.

ABICOR BINZEL®

www.binzel.com.au

ABIMIG® A T LW RANGE

One torch, hundreds of choices.



ABIMIG® A T 255 LW

Technical data (EN 60 974-7):

Rating:	240 A CO_2 220 A Mixed Gases M21 (DIN EN ISO 14175)
Duty cycle:	60 %
Wire size:	0.6–1.2 mm
Weight:	1.9 kg

ABIMIG® A T 355 LW

Technical data (EN 60 974-7):

Rating:	340 A CO_2 320 A Mixed Gases M21 (DIN EN ISO 14175)
Duty cycle:	60 %
Wire size:	0.8–1.6 mm
Weight:	2.25 kg

ABIMIG® A T 455 LW

Technical data (EN 60 974-7):

Rating:	450 A CO_2 400 A Mixed Gases M21 (DIN EN ISO 14175)
Duty cycle:	60 %
Wire size:	0.9–2.4 mm
Weight:	3.0 kg

- Ultra lightweight and robust BIKOX® LW (Low Weight) cable assemblies. In addition to the lightness the BIKOX® LW leaps ahead of the competition with.
- High flexibility – in all temperatures, even well below freezing.
- Extreme UV resistance – ideal for the harsh Australian climate.
- Temperature stability and tear resistance.
- BIKOX® LW cable assemblies have been manufactured using specially selected alloy components leading to increased conductivity and elasticity and up to 50 % lighter than equivalently rated competitors torches. All this without loss of performance, despite the additional weight of the interface for turnable necks.

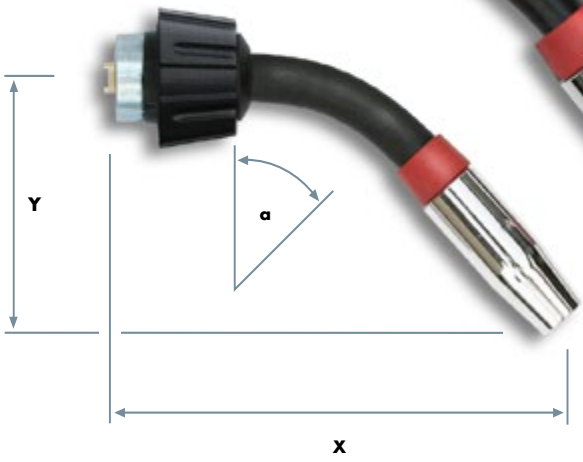
Torch complete	3 m	4 m	5 m	Std. Neck
ABIMIG® A T 255 LW	004.D850.1	004.D851.1	004.D852.1	004.D865.1
ABIMIG® A T 355 LW	014.H390.1	014.H391.1	014.H392.1	014.H423.1
ABIMIG® A T 455 LW	015.D073.1	015.D074.1	015.D075.1	016.D403.1(M8)

ABIMIG® A T LW RANGE

Versatility as a basic principle.



a = 45°/60° or Flexible
X = from 150 to 500 mm
Y = from 70 to 110 mm



The decisive factor for a comfortable and strain-free welding experience is the torch necks geometry and position. With the ABIMIG® A T LW range of torches, the multipoint turnable neck can easily be maneuvered for the specific welding job and the preferred position of an individual welder. Changes can be made on the job, without tools in less than a minute.

Long term studies by the sports science department at the Justus-Liebig University of Giessen in Germany has shown that use of the lightweight BIKOX® LW cables has lead to a significant reduction of strain on the shoulder and arm muscles of the welder, as well as referred stress to other areas of the body including the neck and back areas.

The advantages:

- Increased accuracy and effectiveness of work by reducing fatigue.
- Reduced downtime caused by workplace injuries.

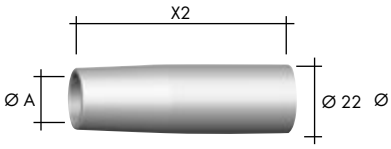
All necks are supplied complete with nozzle, neckliner, tip holder and tip.

Part No.	Suit Torch	Description	Style	Neck Liner
004.D865.1	255	45 Degree X160 Y85	360 Degree turn	122.D038
004.D869.1	255	60 Degree X135 Y105	360 Degree turn	122.D038
014.H420.1	355	45 Degree X160 Y85	360 Degree turn	122.D038
014.H423.1	355	45 Degree X185 Y95	360 Degree turn	122.D038
014.H426.1	355	45 Degree X185 Y95	8 Position	122.D038
014.H428.1	355	45 Degree X350 Y95	360 Degree turn	122.D088
014.H430.1	355	45 Degree X500 Y95	360 Degree turn	122.D073
014.H436	355	60 Degree X165 Y110	8 Position	122.D038
018.D801	355	X260 Y Flexible	Variable	122.D038
016.D403.1	455	45 Degree X220 Y105	8 Position	122.D078
016.D403 Short	455	45 Degree X185 Y105	8 Position	122.D078

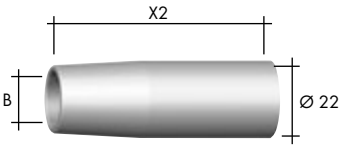
ABIMIG® 255, ABIMIG® 355, ABIMIG® 455

Wear parts

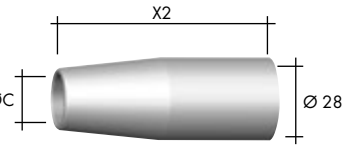
ABIMIG® 255/255T



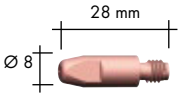
ABIMIG® 355/355T

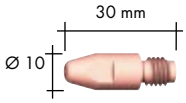


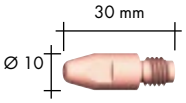
ABIMIG® 455 T8M

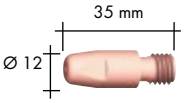


Gas nozzle	**Ø A**	**X2**		**Ø B**	**X2**		**Ø C**	**X2**	
Cylindrical	Ø 18	69 mm	145.D014	Ø 21	72 mm	145.D024	Ø 24	83 mm	145.D249
Conical	Ø 16	70 mm	145.D011	Ø 18	72 mm	145.D021	Ø 19	85 mm	145.D245
Conical	-	-	-	Ø 16	69 mm	145.D022	Ø 16	85 mm	145.D244
Conical	-	-	-	-	-	-	-	-	-
Tapered	Ø 14	67 mm	145.D012	Ø 14	69 mm	145.D023	Ø 13	85 mm	145.D243
Tapered	-	-	-	Ø 12	72 mm	145.D025	-	-	-

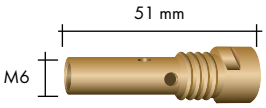


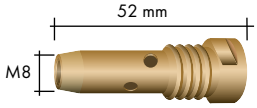


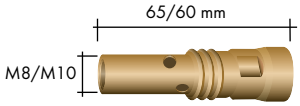




Contact tip		**M6**	**M8**	**M8**	**M10**
E-Cu	Ø 0.8	140.0051	140.0114	140.0114	-
	Ø 0.9	140.0169	140.0214	140.0214	-
	Ø1.0	140.0242	140.0313	140.0313	-
	Ø 1.2	140.0379	140.0442	140.0442	-
	Ø 1.6	-	140.0587	140.0587	-
	Ø 2.4	-	-	-	-
E-Cu for Al	Ø 0.8	141.0001	141.0003	141.0003	-
	Ø 0.9	141.0004	141.0043	141.0043	-
	Ø 1.0	141.0006	141.0008	141.0008	-
	Ø 1.2	141.0010	141.0015	141.0015	141.0059
	Ø 1.6	141.0020	141.0022	141.0022	141.0060
CuCrZr	Ø 0.8	140.0054	140.0117	140.0117	-
	Ø 0.9	140.0172	140.0217	140.0217	140.1248
	Ø 1.0	140.0245	140.0316	140.0316	140.0348
	Ø 1.2	140.0382	140.0445	140.0445	140.0481
	Ø 1.6	-	140.0590	140.0590	140.0616
	Ø 2.4	-	-	140.0679	140.0698



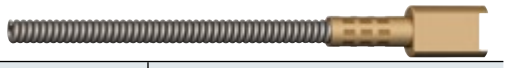




Contact tip holder

M6	004.D624	-	-
M8	-	014.D745	016.D155
M10	-	-	016.D156

Swan neck liner for T-Torches



Standard	Ø 0.6–0.8	122.D037	122.D037	-
	Ø 0.9–1.2	122.D038	122.D038	122.D077
	Ø 1.6	-	122.D045	122.D078
Brass for Al	Ø 0.6–1.0	122.D040	122.D040	-
	Ø 1.0–1.2	122.D041	122.D041	-

Liner Suit 255/355		**for 3 m**	**for 4 m**	**for 5 m**
Liner	Ø 0.6–0.8	124.0011	124.0012	124.0015
Steel	Ø 0.9–1.2	124.0026	124.0031	124.0035
	Ø 1.2–1.6	124.0041	124.0042	124.0044
PTFE liner	Ø 0.6–0.8	126.0005	126.0008	126.0011
Aluminium	Ø 0.9–1.2	126.0021	126.0026	126.0028
	Ø 1.2–1.6	126.0039	126.0042	126.0045
Carbon PTFE liner	Ø 0.6–0.8	127.0002	127.0003	127.0004
All wires	Ø 0.9–1.2	127.0005	127.0007	127.0008
	Ø 1.2–1.6	127.0010	127.0012	127.0013

Liner Suit 455		**for 3, 4 & 5 m**
Liner	Ø 0.9–1.2	124.D039
Steel	Ø 1.2–1.6	124.D044
	Ø 2.4	124.D049
PTFE liner	Ø 1.0–1.2	126.D027
Aluminium	Ø 1.4–1.6	126.D030

ABI-FIT XL™
Extra long-life consumables

ABICOR BINZEL presents the ABI-FIT XL™ range of tip holders and consumables. Easily convert your Tweco*, Tregaskiss* and Bernard* Style torches to use the heavy-duty ABIMIG® consumables. Manage inventory and reduce costs with tried and tested parts found to last far longer than any comparable brand on the market.

MIG / MAG Torch

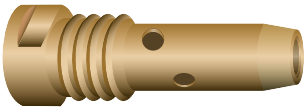
- Bernard® 300 AMP with 1/4 -18NPT
- Bernard® 400 AMP with 1/4 -18NPT
- Tweco® #4
- Tregaskiss® Tough Gun® 350
- Tregaskiss® Tough Gun® 450
- Tregaskiss® Tough Gun® 550
- Tregaskiss® Tough Gun® 650

Insulator



- 016.9127.US

Contact tip holder



- 300-350 M8 Tips H3T-8-NPT
- 400-450 M8 Tips H4T-8-NT
- 400–450 M8 Tips H4T-8-TWE
- 400–650 M10 Tips H4T-10-TWE

Contact tip



Contact tip		M8	M8	M10
E-Cu	Ø 0.8	140.0114	140.0114	-
	Ø 0.9	140.0214	140.0214	-
	Ø1.0	140.0313	140.0313	-
	Ø 1.2	140.0442	140.0442	-
	Ø 1.6	140.0587	140.0587	-
	Ø 2.4	-	-	-
E-Cu for Al	Ø 0.8	141.0003	141.0003	-
	Ø 0.9	141.0043	141.0043	
	Ø 1.0	141.0008	141.0008	-
	Ø 1.2	141.0015	141.0015	141.0059
	Ø 1.6	141.0022	141.0022	141.0060
CuCrZr	Ø 0.8	140.0117	140.0117	-
	Ø 0.9	140.0217	140.0217	-
	Ø 1.0	140.0316	140.0316	140.0348
	Ø 1.2	140.0445	140.0445	140.0481
	Ø 1.6	140.0590	140.0590	140.0616
	Ø 2.4	-	140.0697	140.0698

Gas nozzle



No.	Description
145.D021	Nzl Con ABIMIG® 355 18ID 72mm
145.D022	Nzl Con ABIMIG® 355 16ID 69mm
145.D023	Nzl Tap ABIMIG® 355 14ID 69mm
145.D024	Nzl Cyl ABIMIG® 355 21ID 72mm
145.D025	Nzl Tap ABIMIG® 355 12ID 72mm

No.	Description
145.D243	Gas Nzl Con ABIMIG® 455 13m
145.D244	Gas Nzl Con ABIMIG® 455 16m
145.D245	Gas Nzl Con ABIMIG® 455 19mm

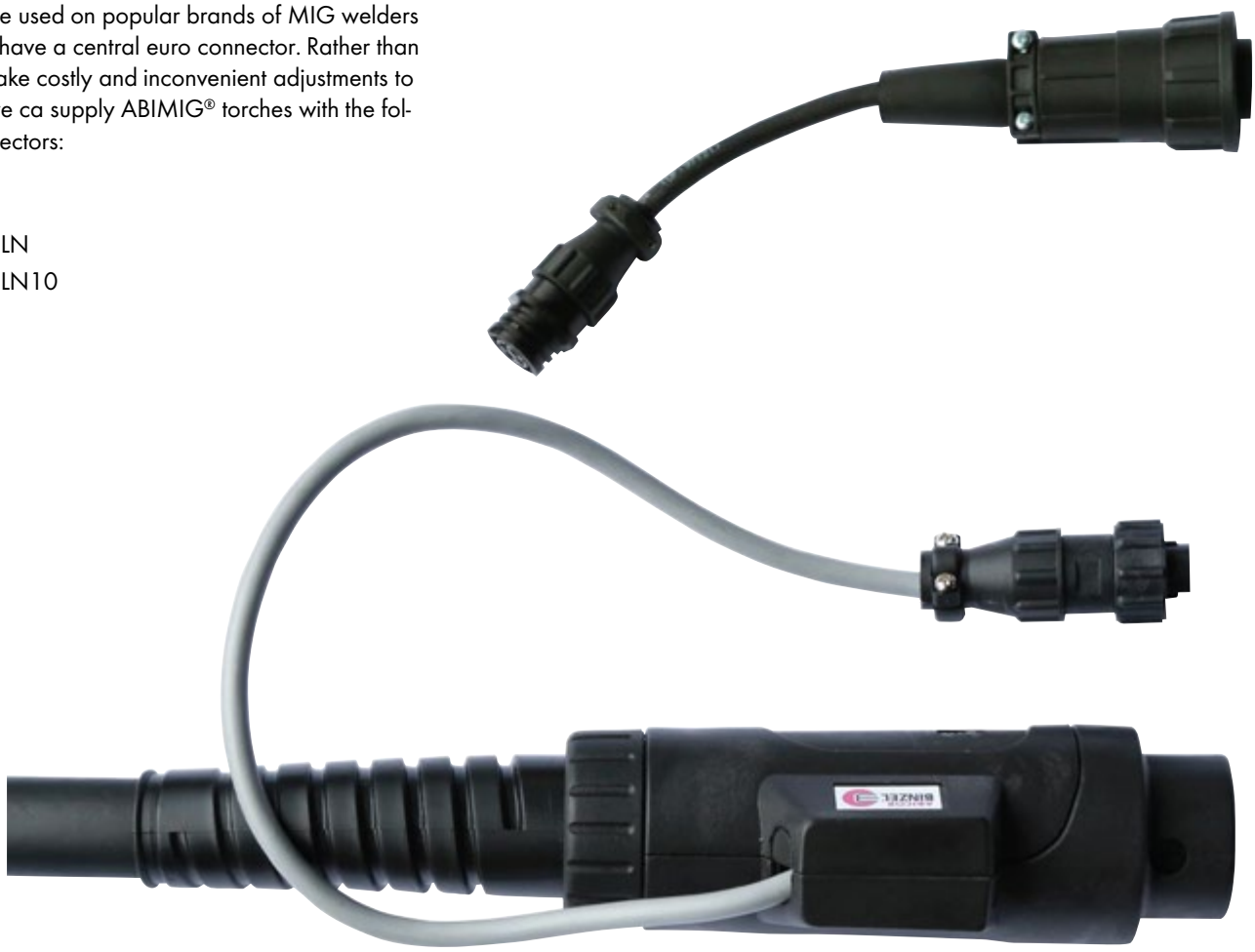
Disclaimer – Tregaskiss, Tough Gun, and Bernard are registered trademarks of ITW. Tweco is a registered trademark of Thermadyne Industries Inc.

ABIMIG® A T LW RANGE

UNI-Plug system

Introducing the UNI-Plug system. Now the ABIMIG® range can be used on popular brands of MIG welders which don't have a central euro connector. Rather than having to make costly and inconvenient adjustments to machines, we ca supply ABIMIG® torches with the following connectors:

- Miller®
- Lincoln® LN
- Lincoln® LN10
- Tweco®



501-D671.1 LINCOLN® L.N



501-D669.1 MILLER®



501.D673.1 LINCOLN® LN10
(5 pin plug)



501-D675.1 TWECO®
(4 pin plug)



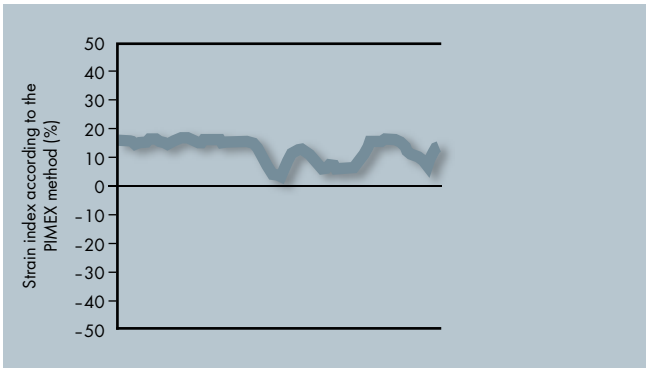
Basic Torch		Specification	Cable assembly length	Part No.
ABIMIG® A T 455 LW	UNI-Plug	3.0 m, UNI-Plug Connection	3.0 m	015.D076.1
		4.0 m, UNI-Plug Connection	4.0 m	015.D077.1
		5.0 m, UNI-Plug Connection	5.0 m	015.D079.1

ABIMIG® A T LW RANGE

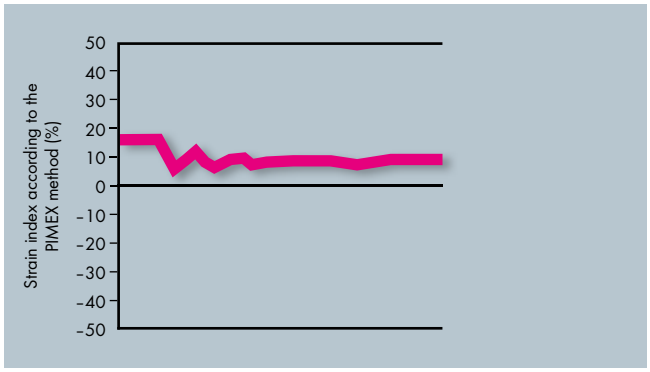
Flexibility that leaves nothing to be desired

Significant strain relief!
Scientific studies taking measurements according to the PIMEX method* document a significant reduction in musculoskeletal load, when the right torch neck was selected.

Measured results with standard torch neck:
The welder is more often working in non-ergonomic positions.



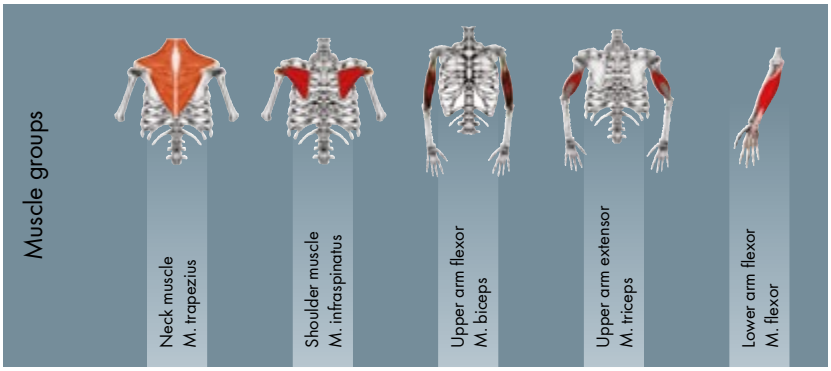
Measured result with adapted torch neck[1]:
Thanks to the adapted torch neck, the welder avoids a strainined position.



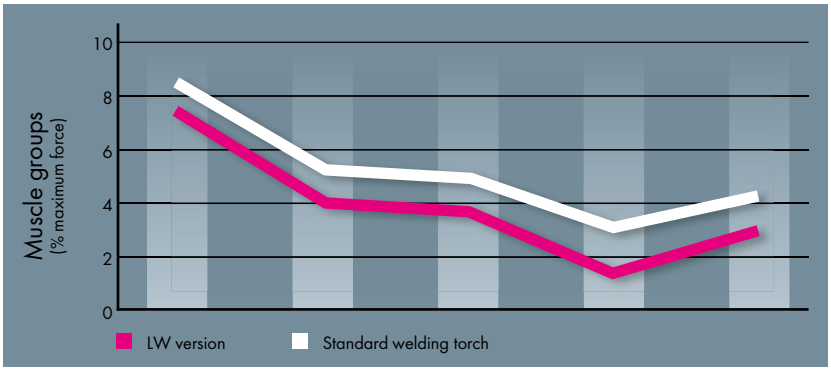
[1] Determined by ABICOR BINZEL in cooperation with a scientific partner

Scientific studies prove the benefits

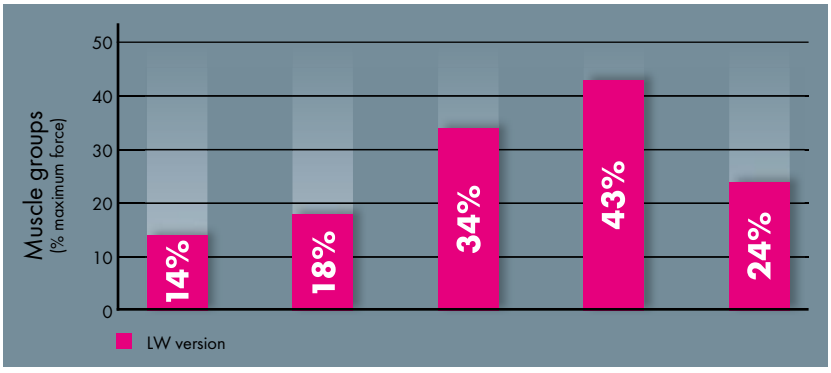
The muscle groups examined (EMG measurements made by the Sport Medicine Institute at JLU in Giessen).



Muscle strain in % when welding overhead.



Relief on the muscles when BIKOX® LW is used on the same job.



*The **PIMEX method** (**PI**cture **M**ixed **EX**posure) is the term used to describe the synchronous recording and visual presentation of work load and employees' medical data in real time.

M&W

Our product range:

- **MIG/MAG**
  - Welding Torches
  - Automatic and Special Torches
  - Push-Pull Welding Torches
  - Fume Extraction Torches
  - Central Adaptor System
- **TIG**
  - Welding Torches
  - Automatic and Special Torches
- **PLASMA**
  - Cutting Torches
  - Welding Torches
  - Automatic and Special Torches
- **Robotic Peripheral Equipment**
  - Robot Torches MIG/TIG/Plasma
  - Robot Mount CAT2/iCAT
  - Torch Change System ATS-Rotor
  - Tool Change System WWS
  - Wire Cutting Station DAV
  - Torch Cleaning Station BRS-LC, BRS-CC and BRS-FP
  - Wire Feeding Station MFS-V2
- **Welding Accessories**
  - Cooling Device
  - Welding Cable Plug and Socket
  - Anti Spatter Spray and Paste

  and so on ...



ABICOR BINZEL®

42 Hinkler Road, Mordialloc.
Victoria 3195, Australia.
☎ +61 (0)3 9580 6500
🖷 +61 (0)3 9580 8796

www.binzel.com.au

IBG GROUP PRO.M315.AU • Bi-500.02.17 • Printed in Australia • © Copyright