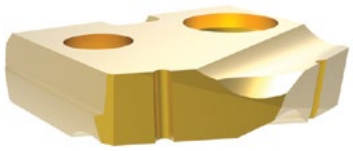
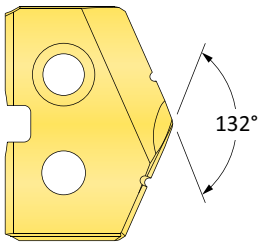
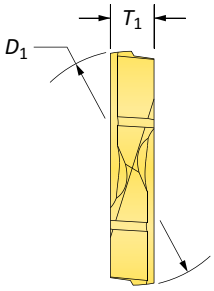
T-A® Original Drill Inserts

Z Series | HSS | Diameter Range: 11.10mm - 12.95mm (0.437” - 0.510”)



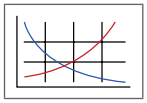




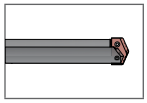
HSS Inserts – Premium Cobalt

Insert				Part No.		
D_1 mm	D_1 inch	Fractional Equivalent	T_1 mm	TiN	TiAlN	TiCN
11.11	0.4375	7/16	2.38	**18ZT-0014**	**18ZA-0014**	**18ZN-0014**
11.46	0.4510	–		**18ZT-.451**	**18ZA-.451**	**18ZN-.451**
11.50	0.4528	–		**18ZT-11.5**	**18ZA-11.5**	**18ZN-11.5**
11.51	0.4531	29/64		**18ZT-.453**	**18ZA-.453**	**18ZN-.453**
11.91	0.4688	15/32		**18ZT-0015**	**18ZA-0015**	**18ZN-0015**
12.00	0.4724	–		**18ZT-12**	**18ZA-12**	**18ZN-12**
12.30	0.4844	31/64		**18ZT-.484**	**18ZA-.484**	**18ZN-.484**
12.50	0.4921	–		**18ZT-12.5**	**18ZA-12.5**	**18ZN-12.5**
12.70	0.5000	1/2		**18ZT-0016**	**18ZA-0016**	**18ZN-0016**
12.85	0.5060	–		**18ZT-.506**	**18ZA-.506**	**18ZN-.506**
12.95	0.5100	–		**18ZT-.510**	**18ZA-.510**	**18ZN-.510**

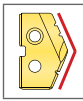
A30: 112 - 143



A30: 28 - 31



A30: 4 - 6



HI, HR, CR, TC, SK, NP, IN, RN, CN, AN, BR, CI, CP, NC, WC

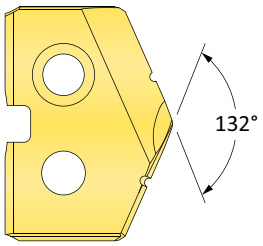
Inserts sold in quantities of 2

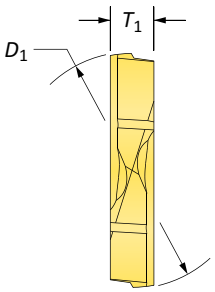
Coatings not listed above can be supplied as non-stocked standards.

TiN = 131T-XXXX	**TiAlN** = 131A-XXXX
TiCN = 131N-XXXX	**AM200®** = 131H-XXXX

T-A® Original Drill Inserts

Z Series | HSS | Diameter Range: 11.10mm - 12.95mm (0.437” - 0.510”)

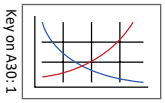




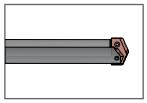
HSS Inserts – Super Cobalt

Insert				Part No.		
D_1 mm	D_1 inch	Fractional Equivalent	T_1 mm	TiN	TiAlN	TiCN
11.11	0.4375	7/16	2.38	**15ZT-0014**	**15ZA-0014**	**15ZN-0014**
11.46	0.4510	–		**15ZT-.451**	**15ZA-.451**	**15ZN-.451**
11.50	0.4528	–		**15ZT-11.5**	**15ZA-11.5**	**15ZN-11.5**
11.51	0.4531	29/64		**15ZT-.453**	**15ZA-.453**	**15ZN-.453**
11.91	0.4688	15/32		**15ZT-0015**	**15ZA-0015**	**15ZN-0015**
12.00	0.4724	–		**15ZT-12**	**15ZA-12**	**15ZN-12**
12.30	0.4844	31/64		**15ZT-.484**	**15ZA-.484**	**15ZN-.484**
12.50	0.4921	–		**15ZT-12.5**	**15ZA-12.5**	**15ZN-12.5**
12.70	0.5000	1/2		**15ZT-0016**	**15ZA-0016**	**15ZN-0016**
12.85	0.5060	–		**15ZT-.506**	**15ZA-.506**	**15ZN-.506**
12.95	0.5100	–		**15ZT-.510**	**15ZA-.510**	**15ZN-.510**

A30: 112 - 143



A30: 28 - 31



A30: 4 - 6

HI, HR, CR, TC, SK, NP, IN, RN, CN, AN, BR, CI, CP, NC, WC

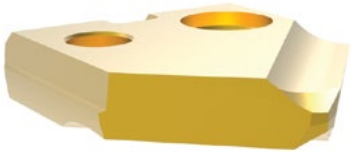
Inserts sold in quantities of 2

Coatings not listed above can be supplied as non-stocked standards.

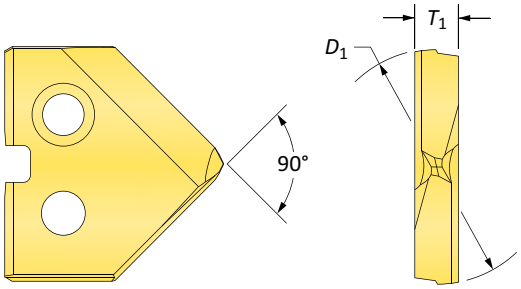
TiN = 131T-XXXX	**TiAlN** = 131A-XXXX
TiCN = 131N-XXXX	**AM200®** = 131H-XXXX

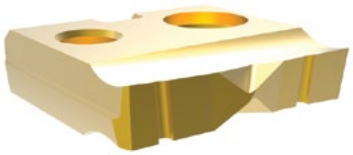
T-A® Original Drill Inserts

Z Series | HSS | Diameter Range: 11.10mm - 12.95mm (0.437” - 0.510”)

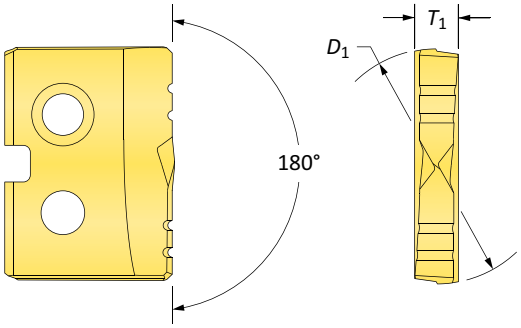


90° Spot & Chamfer





Flat Bottom

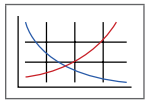


HSS Inserts – Super Cobalt

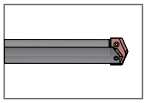
Insert				90° Spot & Chamfer Part No.			Flat Bottom Part No.
D_1 mm	D_1 inch	Fractional Equivalent	T_1 mm	TiN	TiAlN	TiCN	TiN
11.11	0.4375	7/16	2.38	**15ZT-0014-SP**	**15ZA-0014-SP**	**15ZN-0014-SP**	**15ZT-0014-FB**
11.46	0.4510	–		**15ZT-.451-SP**	**15ZA-.451-SP**	**15ZN-.451-SP**	**15ZT-.451-FB**
11.50	0.4528	–		**15ZT-11.5-SP**	**15ZA-11.5-SP**	**15ZN-11.5-SP**	**15ZT-11.5-FB**
11.51	0.4531	29/64		**15ZT-.453-SP**	**15ZA-.453-SP**	**15ZN-.453-SP**	**15ZT-.453-FB**
11.91	0.4688	15/32		**15ZT-0015-SP**	**15ZA-0015-SP**	**15ZN-0015-SP**	**15ZT-0015-FB**
12.00	0.4724	–		**15ZT-12-SP**	**15ZA-12-SP**	**15ZN-12-SP**	**15ZT-12-FB**
12.30	0.4844	31/64		**15ZT-.484-SP**	**15ZA-.484-SP**	**15ZN-.484-SP**	**15ZT-.484-FB**
12.50	0.4921	–		**15ZT-12.5-SP**	**15ZA-12.5-SP**	**15ZN-12.5-SP**	**15ZT-12.5-FB**
12.70	0.5000	1/2		**15ZT-0016-SP**	**15ZA-0016-SP**	**15ZN-0016-SP**	**15ZT-0016-FB**
12.85	0.5060	–		**15ZT-.506-SP**	**15ZA-.506-SP**	**15ZN-.506-SP**	**15ZT-.506-FB**
12.95	0.5100	–		**15ZT-.510-SP**	**15ZA-.510-SP**	**15ZN-.510-SP**	**15ZT-.510-FB**

A30: 112 - 143

Key on A30: 1

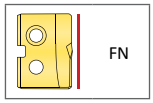


A30: 28 - 31



A30: 4 - 6

A30: 4 - 6



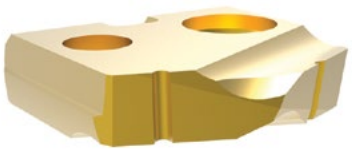
Inserts sold in quantities of 2

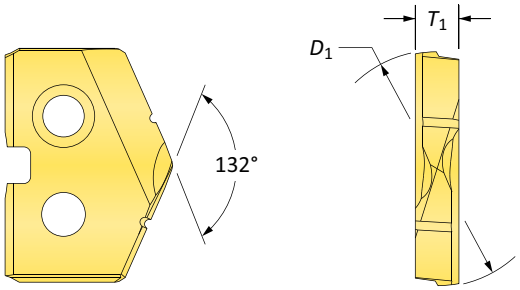
Coatings not listed above can be supplied as non-stocked standards.

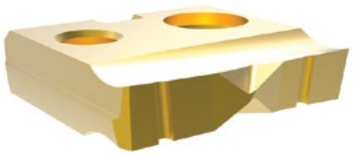
TiN = 131T-XXXX	**TiAlN** = 131A-XXXX
TiCN = 131N-XXXX	**AM200®** = 131H-XXXX

T-A® Original Drill Inserts

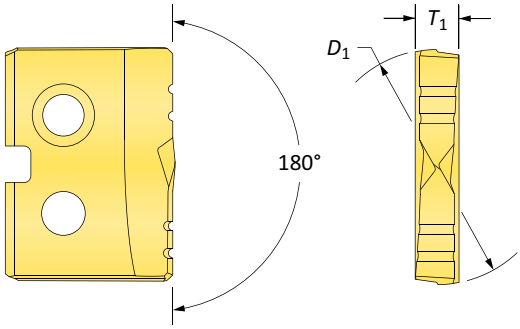
Z Series | Carbide | Diameter Range: 11.10mm - 12.95mm (0.437” - 0.510”)







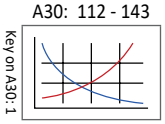
Flat Bottom



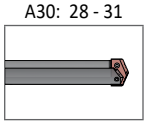
Carbide Inserts – K20 (C2)

Insert				Part No.		Flat Bottom Part No.
D_1 mm	D_1 inch	Fractional Equivalent	T_1 mm	TiN	TiAlN	TiN
11.11	0.4375	7/16	2.38	**1C2ZT-0014**	**1C2ZA-0014**	**1C2ZT-0014-FB**
11.46	0.4510	–		**1C2ZT-.451**	**1C2ZA-.451**	**1C2ZT-.451-FB**
11.50	0.4528	–		**1C2ZT-11.5**	**1C2ZA-11.5**	**1C2ZT-11.5-FB**
11.51	0.4531	29/64		**1C2ZT-.453**	**1C2ZA-.453**	**1C2ZT-.453-FB**
11.91	0.4688	15/32		**1C2ZT-0015**	**1C2ZA-0015**	**1C2ZT-0015-FB**
12.00	0.4724	–		**1C2ZT-12**	**1C2ZA-12**	**1C2ZT-12-FB**
12.30	0.4844	31/64		**1C2ZT-.484**	**1C2ZA-.484**	**1C2ZT-.484-FB**
12.50	0.4921	–		**1C2ZT-12.5**	**1C2ZA-12.5**	**1C2ZT-12.5-FB**
12.70	0.5000	1/2		**1C2ZT-0016**	**1C2ZA-0016**	**1C2ZT-0016-FB**
12.85	0.5060	–		**1C2ZT-.506**	**1C2ZA-.506**	**1C2ZT-.506-FB**
12.95	0.5100	–		**1C2ZT-.510**	**1C2ZA-.510**	**1C2ZT-.510-FB**

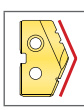
A30: 112 - 143



A30: 28 - 31

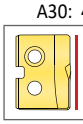


A30: 4 - 6



HI, HR, CR, TC, SK, NP, IN, RN, CN, AN, BR, CI, CP, NC, WC

A30: 4 - 6



FN

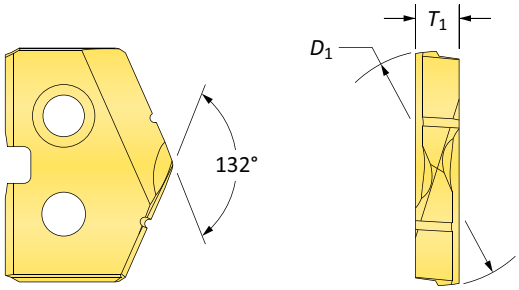
Inserts sold in quantities of 2

Coatings not listed above can be supplied as non-stocked standards.

TiN = 131T-XXXX	**TiAlN** = 131A-XXXX
TiCN = 131N-XXXX	**AM200®** = 131H-XXXX

T-A® Original Drill Inserts

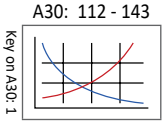
Z Series | Carbide | Diameter Range: 11.10mm - 12.95mm (0.437” - 0.510”)



Carbide Inserts – P40 (C5) | K10 (C3) | N2

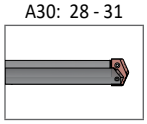
Insert				C5 Part No.		C3 Part No.	N2 Part No.
D_1 mm	D_1 inch	Fractional Equivalent	T_1 mm	TiN	TiAlN	TiAlN (Cast Iron)	Diamond Film
11.11	0.4375	7/16	2.38	1C5ZT-0014	1C5ZA-0014	1C3ZA-0014-CI	1N2ZD-0014
11.46	0.4510	–		1C5ZT-.451	1C5ZA-.451	1C3ZA-.451-CI	1N2ZD-.451
11.50	0.4528	–		1C5ZT-11.5	1C5ZA-11.5	1C3ZA-11.5-CI	1N2ZD-11.5
11.51	0.4531	29/64		1C5ZT-.453	1C5ZA-.453	1C3ZA-.453-CI	1N2ZD-.453
11.91	0.4688	15/32		1C5ZT-0015	1C5ZA-0015	1C3ZA-0015-CI	1N2ZD-0015
12.00	0.4724	–		1C5ZT-12	1C5ZA-12	1C3ZA-12-CI	1N2ZD-12
12.30	0.4844	31/64		1C5ZT-.484	1C5ZA-.484	1C3ZA-.484-CI	1N2ZD-.484
12.50	0.4921	–		1C5ZT-12.5	1C5ZA-12.5	1C3ZA-12.5-CI	1N2ZD-12.5
12.70	0.5000	1/2		1C5ZT-0016	1C5ZA-0016	1C3ZA-0016-CI	1N2ZD-0016
12.85	0.5060	–		1C5ZT-.506	1C5ZA-.506	1C3ZA-.506-CI	1N2ZD-.506
12.95	0.5100	–		1C5ZT-.510	1C5ZA-.510	1C3ZA-.510-CI	1N2ZD-.510

A30: 112 - 143

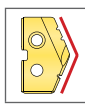


Key on A30: 1

A30: 28 - 31



A30: 4 - 6



HI, HR, CR, TC, SK, NP, IN, RN, CN, AN, BR, CI, CP, NC, WC

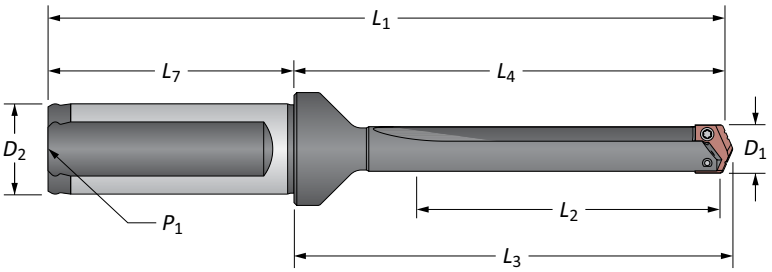
Inserts sold in quantities of 2

Coatings not listed above can be supplied as non-stocked standards.

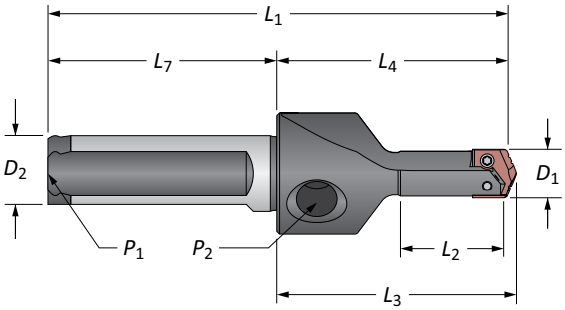
TiN = 131T-XXXX	**TiAlN** = 131A-XXXX
TiCN = 131N-XXXX	**AM200®** = 131H-XXXX

T-A® Drill Insert Holders

Z Series | Flanged Shank



Stub Length



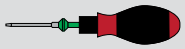
Straight Flute

	Length	D_1	Body L_2	Body L_4	Body L_3	Body L_1	Shank D_2	Shank L_7	Shank P_1	Part No.
ⓜ	Stub	11.5 - 12.5	19.1	47.6	50.0	95.6	16.0	48.0	1/16*	**210Z0S-16FM**
ⓜ	Short	11.5 - 12.5	31.8	61.1	63.5	111.1	20.0	50.0	1/8*	**220Z0S-20FM**
ⓜ	XL	11.5 - 12.5	222.3	251.7	254.1	301.7	20.0	50.0	1/8*	⚠ **270Z0S-20FM**
ⓜ	3XL	11.5 - 12.5	290.5	319.9	322.3	369.9	20.0	50.0	1/8*	⚠ **290Z0S-20FM**
ⓘ	Stub	7/16 - 1/2	3/4	1-7/8	1-31/32	3-3/4	5/8	1-7/8	1/16	**210Z0S-063F**
ⓘ	Short	7/16 - 1/2	1-1/4	2-13/32	2-1/2	4-7/16	3/4	2-1/32	1/8	**220Z0S-075F**
ⓘ	Standard	7/16 - 1/2	2-3/8	3-17/32	3-5/8	5-9/16	3/4	2-1/32	1/8	**240Z0S-075F**
ⓘ	Extended	7/16 - 1/2	4-3/8	5-17/32	5-5/8	7-9/16	3/4	2-1/32	1/8	⚠ **250Z0S-075F**

*Metric thread to BSP and ISO 7-1

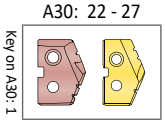
NOTE: Stub length holders have a 1/8" side pipe tap (P_2)

Connection Accessories

Insert Screws	Nylon Locking Screws	Insert Driver	 Preset Torque Hand Driver	Replacement Tips	Admissible Tightening Torque*
7247-IP7-1	7247N-IP7-1	8IP-7	8IP-7TL	8IP-7B	84 N-cm (7.4 in-lbs)

*Tightening torques are calculated with a friction coefficient of μ = 0.14 and develop 90% of ultimate yield strength

A30: 22 - 27

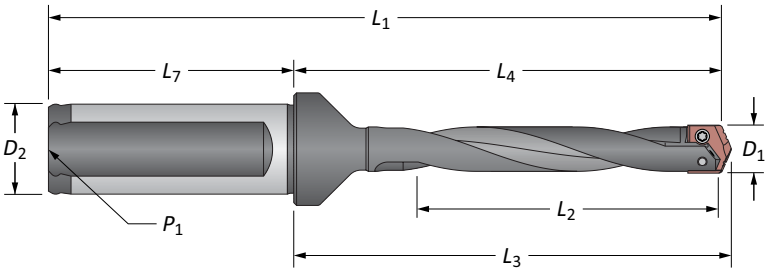


ⓜ = Metric (mm)
ⓘ = Imperial (in)
Screws sold in quantities of 10

⚠ **WARNING** Refer to Speed and Feed charts for recommended adjustments to speeds and feeds. Refer to page A30: 150 for deep hole drilling guidelines in this section of the catalog. Visit **www.alliedmachine.com** for the most up-to-date information and procedures. Factory technical assistance is available for your specific applications through our Application Engineering Team.

T-A® Drill Insert Holders

Z Series | Flanged Shank

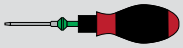


Helical Flute

	Length	D_1	Body L_2	Body L_4	Body L_3	Body L_1	Shank D_2	Shank L_7	Shank P_1	Part No.
ⓜ	Standard	11.5 - 12.5	60.3	89.7	92.1	139.7	20.0	50.0	1/8*	**240Z0H-20FM**
ⓜ	Standard Plus	11.5 - 12.8	86.0	115.4	117.8	165.4	20.0	50.0	1/8*	**245Z0H-20FM**
ⓜ	Extended	11.5 - 12.5	111.1	140.5	142.9	190.5	20.0	50.0	1/8*	⚠ **250Z0H-20FM**
ⓜ	Long	11.5 - 12.8	180.0	209.4	211.8	259.4	20.0	50.0	1/8*	⚠ **260Z0H-20FM**
ⓘ	Standard	7/16 - 1/2	2-3/8	3-17/32	3-5/8	5-9/16	3/4	2-1/32	1/8	**240Z0H-075F**
ⓘ	Standard Plus	7/16 - 1/2	3-3/8	4-35/64	4-41/64	6-43/64	3/4	2-1/32	1/8	**245Z0H-075F**
ⓘ	Extended	7/16 - 1/2	4-3/8	5-17/32	5-5/8	7-9/16	3/4	2-1/32	1/8	⚠ **250Z0H-075F**
ⓘ	Long	7/16 - 1/2	7-1/16	8-1/4	8-11/32	10-3/8	3/4	2-1/32	1/8	⚠ **260Z0H-075F**

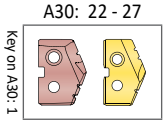
*Metric thread to BSP and ISO 7-1

Connection Accessories

Insert Screws	Nylon Locking Screws	Insert Driver	 Preset Torque Hand Driver	Replacement Tips	Admissible Tightening Torque*
7247-IP7-1	7247N-IP7-1	8IP-7	8IP-7TL	8IP-7B	84 N-cm (7.4 in-lbs)

*Tightening torques are calculated with a friction coefficient of μ = 0.14 and develop 90% of ultimate yield strength

A30: 22 - 27

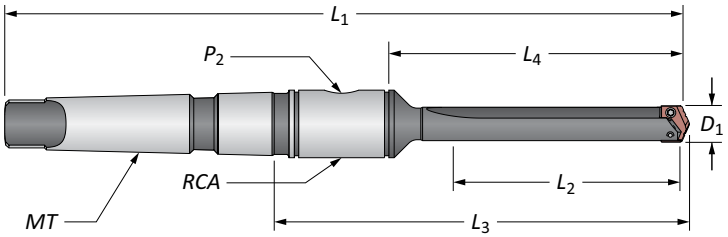


ⓜ = Metric (mm)
ⓘ = Imperial (in)
Screws sold in quantities of 10

⚠ **WARNING** Refer to Speed and Feed charts for recommended adjustments to speeds and feeds. Refer to page A30: 150 for deep hole drilling guidelines in this section of the catalog. Visit **www.alliedmachine.com** for the most up-to-date information and procedures. Factory technical assistance is available for your specific applications through our Application Engineering Team.

T-A® Drill Insert Holders

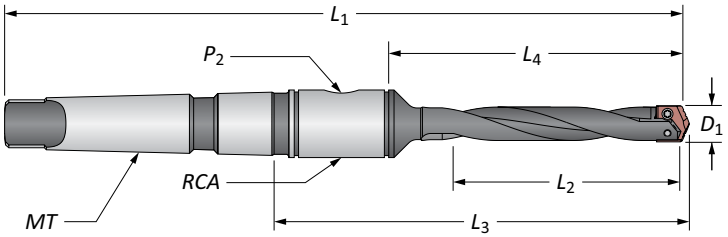
Z Series | Taper Shank



Straight Flute

	Length	D_1	Body L_2	Body L_4	Body L_3	Body L_1	Shank MT	Shank P_2	Shank RCA	Part No.
m	Short	11.5 - 12.5	31.8	51.5	88.0	160.3	#2**	1/16*	2T-2SRM	**220Z0S-002M**
i	Short	7/16 - 1/2	1-1/4	2-1/32	3-15/32	6-5/16	#2	1/16	2T-2SR	**220Z0S-002I**
i	Standard	7/16 - 1/2	2-3/8	3-5/32	4-19/32	7-7/16	#2	1/16	2T-2SR	**240Z0S-002I**
i	Extended	7/16 - 1/2	4-3/8	5-5/32	6-19/32	9-7/16	#2	1/16	2T-2SR	⚠ **250Z0S-002I**

*Metric thread to BSP and ISO 7-1
**Per ISO 296 type BEK



Helical Flute

	Length	D_1	Body L_2	Body L_4	Body L_3	Body L_1	Shank MT	Shank P_2	Shank RCA	Part No.
m	Standard	11.5 - 12.5	60.3	80.2	116.7	188.9	#2**	1/16*	2T-2SRM	**240Z0H-002M**
m	Extended	11.5 - 12.5	111.1	130.9	167.4	239.7	#2**	1/16*	2T-2SRM	⚠ **250Z0H-002M**
i	Standard	7/16 - 1/2	2-3/8	3-5/32	4-19/32	7-7/16	#2	1/16	2T-2SR	**240Z0H-002I**
i	Extended	7/16 - 1/2	4-3/8	5-5/32	6-19/32	9-7/16	#2	1/16	2T-2SR	⚠ **250Z0H-002I**

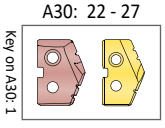
*Metric thread to BSP and ISO 7-1
**Per ISO 296 type BEK

Connection Accessories

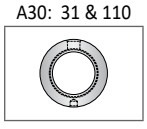
Insert Screws	Nylon Locking Screws	Insert Driver	Preset Torque Hand Driver	Replacement Tips	Admissible Tightening Torque*
7247-IP7-1	7247N-IP7-1	8IP-7	8IP-7TL	8IP-7B	84 N-cm (7.4 in-lbs)

*Tightening torques are calculated with a friction coefficient of μ = 0.14 and develop 90% of ultimate yield strength

A30: 22 - 27



A30: 31 & 110

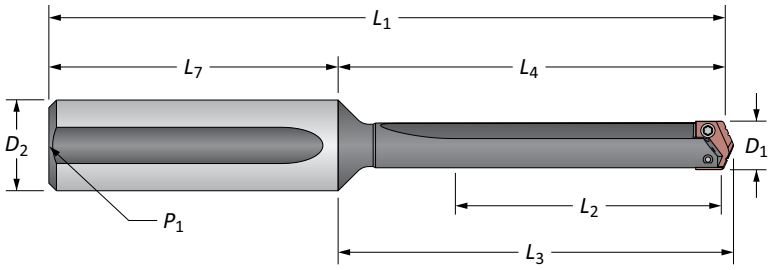


m = Metric (mm)
i = Imperial (in)
Screws sold in quantities of 10

⚠ **WARNING** Refer to Speed and Feed charts for recommended adjustments to speeds and feeds. Refer to page A30: 150 for deep hole drilling guidelines in this section of the catalog. Visit **www.alliedmachine.com** for the most up-to-date information and procedures. Factory technical assistance is available for your specific applications through our Application Engineering Team.

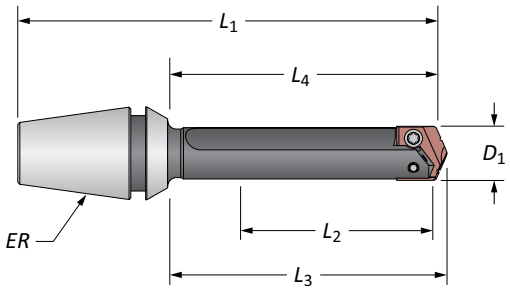
T-A® Drill Insert Holders

Z Series | Straight Shank | ER Collet



Straight Flute

	Length	D_1	Body L_2	Body L_4	Body L_3	Body L_1	Shank D_2	Shank L_7	Shank P_1	Part No.
	Short	7/16 - 1/2	1-1/4	2-1/32	2-1/8	4-13/32	3/4	2-3/8	1/8	**220Z0S-075L**
	Standard	7/16 - 1/2	2-3/8	3-5/32	3-1/4	5-17/32	3/4	2-3/8	1/8	**240Z0S-075L**
ⓘ	Extended	7/16 - 1/2	4-3/8	5-5/32	5-1/4	7-17/32	3/4	2-3/8	1/8	⚠ **250Z0S-075L**
	XL	7/16 - 1/2	8-3/4	9-17/32	9-5/8	11-29/32	3/4	2-3/8	1/8	⚠ **270Z0S-075L**
	3XL	7/16 - 1/2	11-7/16	12-7/32	12-5/16	14-19/32	3/4	2-3/8	1/8	⚠ **290Z0S-075L**



ER Collet Holder

	D_1	Body L_2	Body L_4	Body L_3	Body L_1	ER	Part No.	Collet Nut without Retaining Ring
ⓘ	7/16 - 1/2	1-3/8	1-29/32	2	3-5/64	ER-16	**210Z0S-16ER**	ER-16N
	7/16 - 1/2	1-3/8	1-29/32	2	3-15/64	ER-20	**210Z0S-20ER**	ER-20N

T-A® Drill Accessories

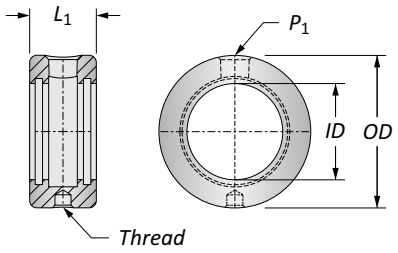
Z Series | Rotary Coolant Adapters | Torx® Plus Screws

Rotary Coolant Adapter (RCA) and Accessories

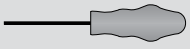
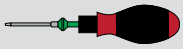
	ID	OD	L_1	Driving Rod Thread	P_1	Part No.	RCA O-Rings Kit Part No.**	RCA O-Rings Replacements
ⓜ	19.05	44.45	22.23	M8 x 1.25	1/8*	⚠ **2T-2SRM**	2T1-2SR	2T1-2OR-10
ⓘ	3/4	1-3/4	7/8	5/16-18	1/8	⚠ **2T-2SR**	2T1-2SR	2T1-2OR-10

*Thread to BSP and ISO 7-1 | **RCA Repair Kit includes (2) O-rings, (2) snap rings, and (2) thrust washers

⚠ Refer to page A30: 110 for proper RCA assembly and safety information



Connection Accessories

Insert Screws	Nylon Locking Screws	 Insert Driver	 Preset Torque Hand Driver	Replacement Tips	Admissible Tightening Torque*
7247-IP7-1	7247N-IP7-1	8IP-7	8IP-7TL	8IP-7B	84 N-cm (7.4 in-lbs)

*Tightening torques are calculated with a friction coefficient of μ = 0.14 and develop 90% of ultimate yield strength

⚠ **WARNING** Refer to Speed and Feed charts for recommended adjustments to speeds and feeds. Refer to page A30: 150 for deep hole drilling guidelines in this section of the catalog. Visit **www.alliedmachine.com** for the most up-to-date information and procedures. Factory technical assistance is available for your specific applications through our Application Engineering Team.

ⓜ = Metric (mm)
ⓘ = Imperial (in)
Screws sold in packs of 10
O-rings sold in packs of 10