

| Drill Dia.<br>D1<br>(mm) | Hole Depth<br>(l/d) | Coolant<br>(Int./Ext.) | Stock<br>VP15TF | Order Number | Dimensions (mm) |    |    |     | Type |
|--------------------------|---------------------|------------------------|-----------------|--------------|-----------------|----|----|-----|------|
|                          |                     |                        |                 |              | L3              | L2 | L1 | D4  |      |
| 6.6                      | 2                   | Ext.                   | ★               | MWE0660SA    | 31              | 31 | 70 | 6.6 | 1    |
|                          | 3                   | Ext.                   | ★               | MWE0660MA    | 43              | 43 | 83 | 6.6 | 1    |
| 6.7                      | 2                   | Ext.                   | ★               | MWE0670SA    | 31              | 31 | 70 | 6.7 | 1    |
|                          | 3                   | Ext.                   | ★               | MWE0670MA    | 43              | 43 | 83 | 6.7 | 1    |
| 6.8                      | 2                   | Ext.                   | ●               | MWE0680SA    | 34              | 34 | 74 | 6.8 | 1    |
|                          | 3                   | Ext.                   | ●               | MWE0680MA    | 43              | 43 | 83 | 6.8 | 1    |
| 6.9                      | 2                   | Ext.                   | ★               | MWE0690SA    | 34              | 34 | 74 | 6.9 | 1    |
|                          | 3                   | Ext.                   | ●               | MWE0690MA    | 43              | 43 | 83 | 6.9 | 1    |
| 7.0                      | 2                   | Ext.                   | ●               | MWE0700SA    | 34              | 34 | 74 | 7   | 1    |
|                          | 3                   | Ext.                   | ●               | MWE0700MA    | 43              | 43 | 83 | 7   | 1    |
| 7.1                      | 2                   | Ext.                   | ★               | MWE0710SA    | 34              | 34 | 74 | 7.1 | 1    |
|                          | 3                   | Ext.                   | ●               | MWE0710MA    | 45              | 45 | 87 | 7.1 | 1    |
| 7.2                      | 2                   | Ext.                   | ★               | MWE0720SA    | 34              | 34 | 74 | 7.2 | 1    |
|                          | 3                   | Ext.                   | ★               | MWE0720MA    | 45              | 45 | 87 | 7.2 | 1    |
| 7.3                      | 2                   | Ext.                   | ★               | MWE0730SA    | 34              | 34 | 74 | 7.3 | 1    |
|                          | 3                   | Ext.                   | ●               | MWE0730MA    | 45              | 45 | 87 | 7.3 | 1    |
| 7.4                      | 2                   | Ext.                   | ★               | MWE0740SA    | 34              | 34 | 74 | 7.4 | 1    |
|                          | 3                   | Ext.                   | ●               | MWE0740MA    | 45              | 45 | 87 | 7.4 | 1    |
| 7.5                      | 2                   | Ext.                   | ★               | MWE0750SA    | 34              | 34 | 74 | 7.5 | 1    |
|                          | 3                   | Ext.                   | ●               | MWE0750MA    | 45              | 45 | 87 | 7.5 | 1    |
| 7.6                      | 2                   | Ext.                   | ★               | MWE0760SA    | 37              | 37 | 79 | 7.6 | 1    |
|                          | 3                   | Ext.                   | ●               | MWE0760MA    | 48              | 48 | 90 | 7.6 | 1    |
| 7.7                      | 2                   | Ext.                   | ★               | MWE0770SA    | 37              | 37 | 79 | 7.7 | 1    |
|                          | 3                   | Ext.                   | ●               | MWE0770MA    | 48              | 48 | 90 | 7.7 | 1    |
| 7.8                      | 2                   | Ext.                   | ●               | MWE0780SA    | 37              | 37 | 79 | 7.8 | 1    |
|                          | 3                   | Ext.                   | ★               | MWE0780MA    | 48              | 48 | 90 | 7.8 | 1    |
| 7.9                      | 2                   | Ext.                   | ★               | MWE0790SA    | 37              | 37 | 79 | 7.9 | 1    |
|                          | 3                   | Ext.                   | ★               | MWE0790MA    | 48              | 48 | 90 | 7.9 | 1    |
| 8.0                      | 2                   | Ext.                   | ●               | MWE0800SA    | 37              | 37 | 79 | 8   | 1    |
|                          | 3                   | Ext.                   | ●               | MWE0800MA    | 48              | 48 | 90 | 8   | 1    |
| 8.1                      | 2                   | Ext.                   | ●               | MWE0810SA    | 37              | 37 | 79 | 8.1 | 1    |
|                          | 3                   | Ext.                   | ●               | MWE0810MA    | 53              | 53 | 96 | 8.1 | 1    |
| 8.2                      | 2                   | Ext.                   | ★               | MWE0820SA    | 37              | 37 | 79 | 8.2 | 1    |
|                          | 3                   | Ext.                   | ●               | MWE0820MA    | 53              | 53 | 96 | 8.2 | 1    |
| 8.3                      | 2                   | Ext.                   | ★               | MWE0830SA    | 37              | 37 | 79 | 8.3 | 1    |
|                          | 3                   | Ext.                   | ●               | MWE0830MA    | 53              | 53 | 96 | 8.3 | 1    |
| 8.4                      | 2                   | Ext.                   | ★               | MWE0840SA    | 37              | 37 | 79 | 8.4 | 1    |
|                          | 3                   | Ext.                   | ●               | MWE0840MA    | 53              | 53 | 96 | 8.4 | 1    |
| 8.5                      | 2                   | Ext.                   | ●               | MWE0850SA    | 37              | 37 | 79 | 8.5 | 1    |
|                          | 3                   | Ext.                   | ●               | MWE0850MA    | 53              | 53 | 96 | 8.5 | 1    |
| 8.6                      | 2                   | Ext.                   | ★               | MWE0860SA    | 40              | 40 | 84 | 8.6 | 1    |
|                          | 3                   | Ext.                   | ●               | MWE0860MA    | 55              | 55 | 98 | 8.6 | 1    |
| 8.7                      | 2                   | Ext.                   | ★               | MWE0870SA    | 40              | 40 | 84 | 8.7 | 1    |
|                          | 3                   | Ext.                   | ●               | MWE0870MA    | 55              | 55 | 98 | 8.7 | 1    |
| 8.8                      | 2                   | Ext.                   | ★               | MWE0880SA    | 40              | 40 | 84 | 8.8 | 1    |
|                          | 3                   | Ext.                   | ●               | MWE0880MA    | 55              | 55 | 98 | 8.8 | 1    |
| 8.9                      | 2                   | Ext.                   | ★               | MWE0890SA    | 40              | 40 | 84 | 8.9 | 1    |
|                          | 3                   | Ext.                   | ★               | MWE0890MA    | 55              | 55 | 98 | 8.9 | 1    |
| 9.0                      | 2                   | Ext.                   | ●               | MWE0900SA    | 40              | 40 | 84 | 9   | 1    |
|                          | 3                   | Ext.                   | ●               | MWE0900MA    | 55              | 55 | 98 | 9   | 1    |

| Drill Dia.<br>D1<br>(mm) | Hole Depth<br>(l/d) | Coolant<br>(Int./Ext.) | Stock<br>VP15TF | Order Number | Dimensions (mm) |    |     |      | Type |
|--------------------------|---------------------|------------------------|-----------------|--------------|-----------------|----|-----|------|------|
|                          |                     |                        |                 |              | L3              | L2 | L1  | D4   |      |
| 9.1                      | 2                   | Ext.                   | ●               | MWE0910SA    | 40              | 40 | 84  | 9.1  | 1    |
|                          | 3                   | Ext.                   | ●               | MWE0910MA    | 58              | 58 | 102 | 9.1  | 1    |
| 9.2                      | 2                   | Ext.                   | ●               | MWE0920SA    | 40              | 40 | 84  | 9.2  | 1    |
|                          | 3                   | Ext.                   | ●               | MWE0920MA    | 58              | 58 | 102 | 9.2  | 1    |
| 9.3                      | 2                   | Ext.                   | ★               | MWE0930SA    | 40              | 40 | 81  | 9.3  | 1    |
|                          | 3                   | Ext.                   | ★               | MWE0930MA    | 58              | 58 | 102 | 9.3  | 1    |
| 9.4                      | 2                   | Ext.                   | ★               | MWE0940SA    | 40              | 40 | 84  | 9.4  | 1    |
|                          | 3                   | Ext.                   | ★               | MWE0940MA    | 58              | 58 | 102 | 9.4  | 1    |
| 9.5                      | 2                   | Ext.                   | ★               | MWE0950SA    | 40              | 40 | 84  | 9.5  | 1    |
|                          | 3                   | Ext.                   | ●               | MWE0950MA    | 58              | 58 | 102 | 9.5  | 1    |
| 9.6                      | 2                   | Ext.                   | ★               | MWE0960SA    | 43              | 43 | 89  | 9.6  | 1    |
|                          | 3                   | Ext.                   | ●               | MWE0960MA    | 60              | 60 | 105 | 9.6  | 1    |
| 9.7                      | 2                   | Ext.                   | ★               | MWE0970SA    | 43              | 43 | 89  | 9.7  | 1    |
|                          | 3                   | Ext.                   | ●               | MWE0970MA    | 60              | 60 | 105 | 9.7  | 1    |
| 9.8                      | 2                   | Ext.                   | ★               | MWE0980SA    | 43              | 43 | 89  | 9.8  | 1    |
|                          | 3                   | Ext.                   | ★               | MWE0980MA    | 60              | 60 | 105 | 9.8  | 1    |
| 9.9                      | 2                   | Ext.                   | ★               | MWE0990SA    | 43              | 43 | 89  | 9.9  | 1    |
|                          | 3                   | Ext.                   | ★               | MWE0990MA    | 60              | 60 | 105 | 9.9  | 1    |
| 10.0                     | 2                   | Ext.                   | ●               | MWE1000SA    | 43              | 43 | 89  | 10   | 1    |
|                          | 3                   | Ext.                   | ●               | MWE1000MA    | 60              | 60 | 105 | 10   | 1    |
| 10.1                     | 2                   | Ext.                   | ★               | MWE1010SA    | 43              | 43 | 89  | 10.1 | 1    |
|                          | 3                   | Ext.                   | ●               | MWE1010MA    | 66              | 66 | 112 | 10.1 | 1    |
| 10.2                     | 2                   | Ext.                   | ●               | MWE1020SA    | 43              | 43 | 89  | 10.2 | 1    |
|                          | 3                   | Ext.                   | ●               | MWE1020MA    | 66              | 66 | 112 | 10.2 | 1    |
| 10.3                     | 2                   | Ext.                   | ★               | MWE1030SA    | 43              | 43 | 89  | 10.3 | 1    |
|                          | 3                   | Ext.                   | ●               | MWE1030MA    | 66              | 66 | 112 | 10.3 | 1    |
| 10.4                     | 2                   | Ext.                   | ★               | MWE1040SA    | 43              | 43 | 89  | 10.4 | 1    |
|                          | 3                   | Ext.                   | ●               | MWE1040MA    | 66              | 66 | 112 | 10.4 | 1    |
| 10.5                     | 2                   | Ext.                   | ●               | MWE1050SA    | 43              | 43 | 89  | 10.5 | 1    |
|                          | 3                   | Ext.                   | ●               | MWE1050MA    | 66              | 66 | 112 | 10.5 | 1    |
| 10.6                     | 2                   | Ext.                   | ★               | MWE1060SA    | 43              | 43 | 89  | 10.6 | 1    |
|                          | 3                   | Ext.                   | ★               | MWE1060MA    | 68              | 68 | 114 | 10.6 | 1    |
| 10.7                     | 2                   | Ext.                   | ★               | MWE1070SA    | 47              | 47 | 95  | 10.7 | 1    |
|                          | 3                   | Ext.                   | ★               | MWE1070MA    | 68              | 68 | 114 | 10.7 | 1    |
| 10.8                     | 2                   | Ext.                   | ★               | MWE1080SA    | 47              | 47 | 95  | 10.8 | 1    |
|                          | 3                   | Ext.                   | ●               | MWE1080MA    | 68              | 68 | 114 | 10.8 | 1    |
| 10.9                     | 2                   | Ext.                   | ★               | MWE1090SA    | 47              | 47 | 95  | 10.9 | 1    |
|                          | 3                   | Ext.                   | ★               | MWE1090MA    | 68              | 68 | 114 | 10.9 | 1    |
| 11.0                     | 2                   | Ext.                   | ●               | MWE1100SA    | 47              | 47 | 95  | 11   | 1    |
|                          | 3                   | Ext.                   | ●               | MWE1100MA    | 68              | 68 | 114 | 11   | 1    |
| 11.1                     | 2                   | Ext.                   | ★               | MWE1110SA    | 47              | 47 | 95  | 11.1 | 1    |
|                          | 3                   | Ext.                   | ●               | MWE1110MA    | 71              | 71 | 118 | 11.1 | 1    |
| 11.2                     | 2                   | Ext.                   | ●               | MWE1120SA    | 47              | 47 | 95  | 11.2 | 1    |
|                          | 3                   | Ext.                   | ●               | MWE1120MA    | 71              | 71 | 118 | 11.2 | 1    |
| 11.3                     | 2                   | Ext.                   | ★               | MWE1130SA    | 47              | 47 | 95  | 11.3 | 1    |
|                          | 3                   | Ext.                   | ★               | MWE1130MA    | 71              | 71 | 118 | 11.3 | 1    |
| 11.4                     | 2                   | Ext.                   | ★               | MWE1140SA    | 47              | 47 | 95  | 11.4 | 1    |
|                          | 3                   | Ext.                   | ★               | MWE1140MA    | 71              | 71 | 118 | 11.4 | 1    |
| 11.5                     | 2                   | Ext.                   | ★               | MWE1150SA    | 47              | 47 | 95  | 11.5 | 1    |
|                          | 3                   | Ext.                   | ●               | MWE1150MA    | 71              | 71 | 118 | 11.5 | 1    |

CUTTING CONDITIONS > L026  
 OPERATION GUIDANCE > L027  
 TECHNICAL DATA > N001

L023