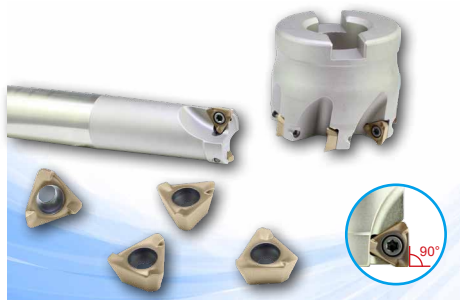


**Shoulder Milling - CATP**

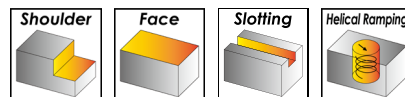
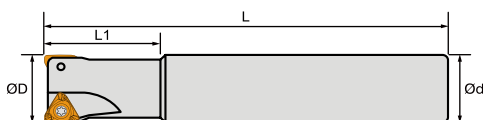
方肩銑刀

**CATP Series**



- Use TPMX inserts with 3 cutting edges.
- Sharp cutting edges for various low milling force applications.
- 20~80mm cutter diameter, max. 11mm depth of cut.
- 使用 TPMX 銑刀片，3 個可用切削角
- 出色的銳利刀口設計適用於各種低銑削阻力的應用
- 20~80mm 刀桿直徑，最大切削深度可達 11mm

**CATPE - Milling Tools 方肩銑刀**



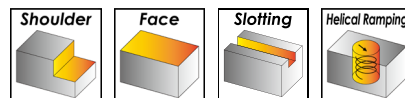
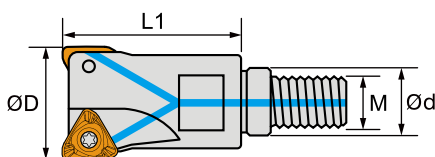
Insert Brand 建議刀片 : Winstar, Taegutec, ...

| Order No.<br>訂購編碼 | D  | L1 | L   | d  | T | Inserts  | Screw   | Wrench | Stock |
|-------------------|----|----|-----|----|---|----------|---------|--------|-------|
| ICATPE102020130   | 20 | 50 | 130 | 20 | 2 | TPMX1004 | ITS2517 | ITK08  | ●     |
| ICATPE103025150   | 25 | 55 | 150 | 25 | 3 |          |         |        | ●     |
| ICATPE503033200   | 33 | 45 | 200 | 32 | 3 | TPMX1505 | ITS4014 | ITK15  | ●     |
| ICATPE504040200   | 40 | 45 | 200 | 32 | 4 |          |         |        | ○     |

● stock ○ by inquiry

Customize available.

**CATPM - Modular Milling Heads 方肩銑刀頭**



Insert Brand 建議刀片 : Winstar, Taegutec, ...

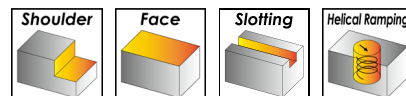
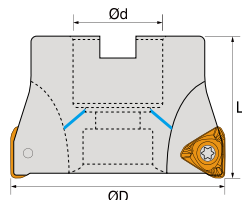
| Order No.<br>訂購編碼 | D  | L1 | d    | M   | T | Coolant | Inserts  | Screw   | Wrench | Stock |
|-------------------|----|----|------|-----|---|---------|----------|---------|--------|-------|
| ICATPM102020100   | 20 | 35 | 10.5 | M10 | 2 |         | TPMX1004 | ITS2517 | ITK08  | ○     |
| ICATPM102020101   | 20 | 35 | 18   | M10 | 2 | ✓       |          |         |        | ●     |
| ICATPM102021100   | 21 | 35 | 10.5 | M10 | 2 |         |          |         |        | ●     |
| ICATPM103025120   | 25 | 35 | 12.5 | M12 | 3 |         |          |         |        | ○     |
| ICATPM103025121   | 25 | 35 | 21   | M12 | 3 | ✓       |          |         |        | ●     |
| ICATPM103026120   | 26 | 35 | 12.5 | M12 | 3 |         |          |         |        | ●     |
| ICATPM105032160   | 32 | 43 | 29   | M16 | 5 |         |          |         |        | ●     |
| ICATPM105032161   | 32 | 43 | 17   | M16 | 5 | ✓       |          |         |        | ●     |
| ICATPM105033160   | 33 | 43 | 17   | M16 | 5 |         |          |         |        | ●     |
| ICATPM105033161   | 33 | 43 | 17   | M16 | 5 | ✓       |          |         |        | ●     |

● stock ○ by inquiry

※ For screw-in type adapter, please refer to Tooling System 搭配鎖牙式刀桿，請參考刀具系統

**Shoulder Milling - CATP** 方肩銑刀

**CATPF - Milling Tools** 方肩銑刀



Insert Brand 建議刀片 : Winstar, Taegutec, ...

| Order No.<br>訂購編碼 | D  | L  | d  | T | Coolant | Inserts  | Screw   | Wrench | Stock |
|-------------------|----|----|----|---|---------|----------|---------|--------|-------|
| ICATPF106050221   | 50 | 50 | 22 | 6 | ✓       | TPMX1004 | ITS2517 | ITK08  | ●     |
| ICATPF107050220   | 50 | 50 | 22 | 7 |         |          |         |        | ●     |
| ICATPF107063221   | 63 | 50 | 22 | 7 | ✓       |          |         |        | ●     |
| ICATPF109063220   | 63 | 50 | 22 | 9 |         |          |         |        | ●     |
| ICATPF504040161   | 40 | 40 | 16 | 4 | ✓       | TPMX1505 | ITS4004 | ITK15  | ●     |
| ICATPF505050221   | 50 | 40 | 22 | 5 | ✓       |          |         |        | ●     |
| ICATPF506063221   | 63 | 40 | 22 | 6 | ✓       |          |         |        | ●     |
| ICATPF508080271   | 80 | 50 | 27 | 8 | ✓       |          |         |        | ●     |

● stock ○ by inquiry

Customize available.

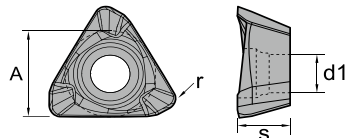
**Recommended Cutting Conditions** 建議切削數據

| Working Material           | TPMX1004  |             |           | TPMX1505  |             |            |
|----------------------------|-----------|-------------|-----------|-----------|-------------|------------|
|                            | Vc        | fz          | ap        | Vc        | fz          | ap         |
| Carbon Steel / Alloy Steel | 120 ~ 250 | 0.08 ~ 0.20 | 0.3 ~ 7.0 | 120 ~ 250 | 0.12 ~ 0.28 | 0.5 ~ 11.0 |
| Stainless Steel            | 100 ~ 180 | 0.05 ~ 0.15 | 0.3 ~ 4.0 | 100 ~ 180 | 0.10 ~ 0.22 | 0.5 ~ 7.0  |
| Cast Iron                  | 120 ~ 250 | 0.08 ~ 0.20 | 0.3 ~ 6.0 | 120 ~ 250 | 0.12 ~ 0.28 | 0.5 ~ 10.0 |
| High Temperature Alloy     | 40 ~ 100  | 0.05 ~ 0.12 | 0.3 ~ 4.0 | 40 ~ 100  | 0.10 ~ 0.18 | 0.5 ~ 7.0  |
| Hardened Steel             | 50 ~ 100  | 0.05 ~ 0.13 | 0.3 ~ 4.0 | 50 ~ 100  | 0.10 ~ 0.20 | 0.5 ~ 7.0  |





Indexable Milling

## Insert Specifications 刀片規格

| Insert     | Dimensions (mm) |   |     |      |
|------------|-----------------|---|-----|------|
|            | A               | S | r   | d1   |
| TPMX100404 | 6.9             | 4 | 0.4 | 3    |
| TPMX100408 | 6.9             | 4 | 0.8 | 3    |
| TPMX150508 | 10.7            | 5 | 0.8 | 4.85 |



## Insert Designation 刀片型號

| Insert  | Order No.<br>訂購編碼 | Designation          | Working Material |   |   |   |   |   |
|---|-------------------|----------------------|------------------|---|---|---|---|---|
|   |                   |                      | P                | M | K | N | S | H |
|   | ITPMX100404SG32HS | TPMX100404-SG-CX32HS | ●                | ● | ● |   | ○ |   |
|   | ITPMX100404SG33TX | TPMX100404-SG-CX33TX | ●                | ● | ● |   | ● | ● |
|   |                   |                      |                  |   |   |   |   |   |
|  | ITPMX100408SG32HS | TPMX100408-SG-CX32HS | ●                | ● | ● |   | ○ |   |
|   | ITPMX100408SG33TX | TPMX100408-SG-CX33TX | ●                | ● | ● |   | ● | ● |
|   |                   |                      |                  |   |   |   |   |   |
|  | ITPMX100408MG23AX | TPMX100408-MG-CX23AX | ○                | ○ | ○ |   | ○ | ● |
|   | ITPMX100408MG32HS | TPMX100408-MG-CX32HS | ●                | ● | ● |   | ○ |   |
|   | ITPMX100408MG33TX | TPMX100408-MG-CX33TX | ●                | ● | ● |   | ● | ● |
|   | ITPMX100408MG43TX | TPMX100408-MG-CX43TX | ●                | ● | ● |   | ● |   |
|   | ITPMX150508MG23AX | TPMX150508-MG-CX23AX | ○                | ○ | ○ |   | ○ | ● |
|   | ITPMX150508MG32HS | TPMX150508-MG-CX32HS | ●                | ● | ● |   | ○ |   |
|   | ITPMX150508MG33TX | TPMX150508-MG-CX33TX | ●                | ● | ● |   | ● | ● |
|   | ITPMX150508MG43TX | TPMX150508-MG-CX43TX | ●                | ● | ● |   | ● |   |