



# SUPER ALLOY SHOULDER MILLING

ADGT+MET190



## 01 // Product Feature

### ① Geometry Feature - SM

#### Variable edge width

- High edge strength
- Extended tool life

#### Special space curve edge

- High efficient rough milling



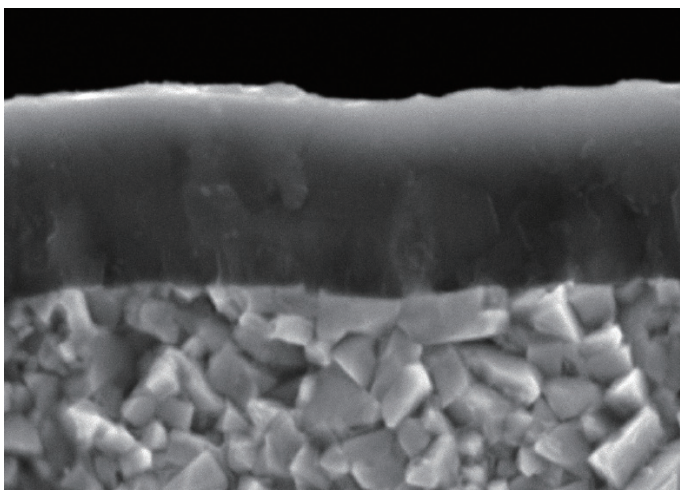
#### Variable rake angle design

- Improved cutting stability

#### Wiper design

- Wiper design on insert itself

### ② Grade Feature - GSM7130



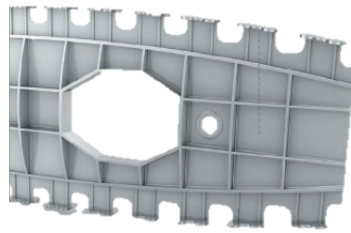
Based on technology innovation, developed brand new milling grade to meet the requirement of super alloy milling

- ① High strength substrate technology
- ② High thermal conductivity substrate technology
- ③ High wear resistance coating technology
- ④ Excellent anti bond technology

### ③ Typical Application



Super alloy frame



Sliding rail



Cross bar

### ④ Application Range



- ① Suitable for roughing to semi-finishing at low and medium speed
- ② Workpiece material : super alloy such as TC4, TC18, TC21 etc.  
And also apply to stainless steel
- ③ Face milling, cavity milling, side milling, plunge milling
- ④ Suitable for different cutting depth. Max. depth AD10(9mm), AD12(11.5mm), AD18(16mm)

ADGT+MET190

## 02 // Application Cases

### ① Super alloy frame web cavity milling

Inserts	ADGT120430R-SM
Grade	GSM7130
Cutter	MET190-032R03P32-AD12
Workpiece	TC4
Speed	40m/min
Feed	0.15mm/z
Depth	2.0mm
Mode	Cavity milling
Cooling	Wet cooling / External cooling
Result	High wear resistance in medium and low speed, increased 40% of tool life than competitors from European and American brand



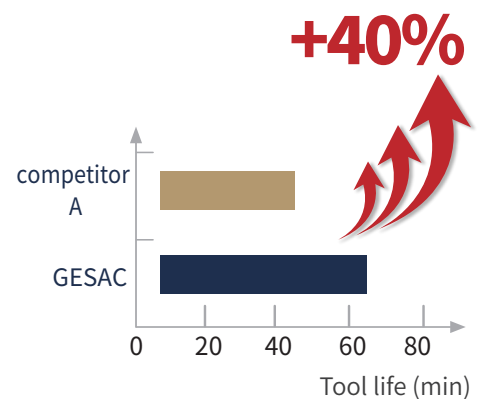
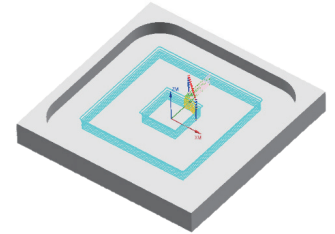
CW Company - 45min



GESAC - 45min

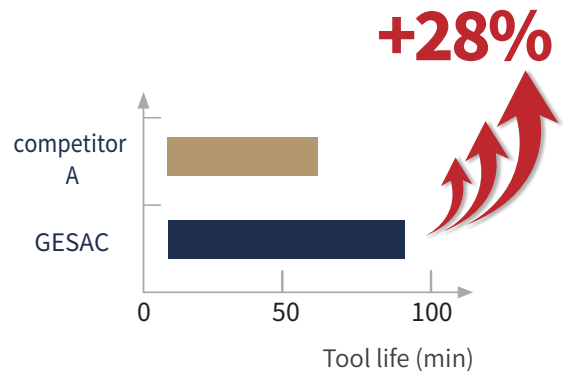


GESAC - 63min





### ② Super alloy structure part slot milling

Inserts	ADGT180630R-SM
Grade	GSM7130
Cutter	MET190-032R03P32-AD18
Workpiece	TC18 (HRC40-45)
Speed	35m/min
Feed	0.11mm/z
Depth	1.0mm
Mode	Slot milling
Cooling	Wet cooling / External cooling
Result	High wear resistance in medium and low speed, increased 28% of tool life than competitors from European and American brand



## 03 / Specification

Geometry	Insert	Geometry Drawing	Application Condition
SM			Low cutting force, provides better machining quality

Type	Cutter	Dia. Range	Teeth Range	Inserts
Arbor		$\Phi 50-\Phi 100$	5-12	ADGT1204
		$\Phi 50-\Phi 160$	4-12	ADGT1806
Cylindrical Straight Type		$\Phi 16-\Phi 32$	2-5	ADGT10T3
		$\Phi 20-\Phi 40$	2-4	ADGT1204
		$\Phi 32-\Phi 40$	2-4	ADGT1806
Replaceable Tool Head		$\Phi 20-\Phi 40$	2-5	ADGT1204
		$\Phi 32-\Phi 40$	2-4	ADGT1806

