

cam-tool Solutions Cutting Sample Data



- Data Translation (IGES)

approx. 12 sec.



- CAM Condition Setting

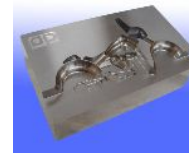
approx. 45 min.

- CAM Calculation

approx. 1 hr. 05 min.

Z-level Rough Cutting	D6 R3	0.1
Z-level Finishing	D2 R1	0.06
Scanning-line Area	D2 R1	0.06
Re-machining	D1 R0.5	0.04

Product : Toy (Motorbike)
 Work Size : 190mm x 110mm x 60mm
 Machine : MORI SEIKI CO., LTD.
 Cutting Tool : NS TOOL CO., LTD.
 CPU : Xeon 3.4GHz
 Process Time : Total 11hrs 28min



- Machining

NAK80 (HRC40) machined by HSM
 approx. 9 hrs. 38 min.

Process	Cutting Mode	Tool Type (mm)	Step Over (mm)	Step Down (mm)	Cusp Height (μm)	Stock (mm)	Length of Cut (mm)	Spin. Speed (RPM)	Feed Rate (mm/min.)	Machining Time
Rough	Z-level Roughing	5R BALL	4	0.6	-	0.2	45,694	12,000	4,800	22min. 54sec.
Semi Rough	Z-level Roughing + Optimization	3R BALL	2.5	0.35	-	0.1	24,105	20,000	3,600	23min. 53sec.
Semi Rough (Concave corners)	Re-machining	1R BALL	-	-	Rmax 10	0.06	104,258	20,000	1,600	1hr. 30min. 44sec.
Semi Finish	Z-level Finishing + Scanning-line Area	1R BALL	-	-	Rmax 10	0.06	120,456	20,000	1,200	1hr. 38min. 50sec.
Semi Finish (Concave corners)	Re-machining	0.5R BALL	-	-	Rmax 5	0.04	16,820	20,000	900	20min. 12sec.
Finish	Z-level Finishing + Scanning-line Area	1R BALL	-	-	Rmax 1	0	298,681	20,000	1,200	4hrs. 10min. 22sec.
Finish (Concave corners)	Re-machining	0.5R BALL	-	-	Rmax 1	0	44,308	20,000	900	1hr. 10min. 38sec.
Total							654,322			Total 9hrs. 37min. 33sec.