

TOMEI Camshaft Spec Card

PART NAME		PROCAM		ENGINE		4G63 EVO 9 SOLID	
PART NUMBER		SET		IN	146A280115	EX	146B280115
GRIND	IN	280° / 11.50mm	-	FACE CIRCLE(Φ)	IN	Φ30.0	ROCKER ARM RATIO*
	EX	280° / 11.50mm	-		EX	Φ30.0	
LIFT		@CAM 6.75mm	@VALVE 11.50mm	LOBE CENTER(°)	IN	130.0	VALVE CLEARANCE WHEN COLD
		EX @CAM 6.75mm	EX @VALVE 11.50mm		EX	110.0	

* ALL LIFTS ARE BASED ON ZERO LASH AND THORETICAL ROCKER ARM RATIOS

CAM TIMING		OPENS(°)		CLOSES(°)		Actual Duration @ Opening(°)
Actual Duration	IN	BTDC	6.0	ABDC	94.0	280.0
Valve Lift	EX	BTDC	74.0	ATDC	26.0	280.0

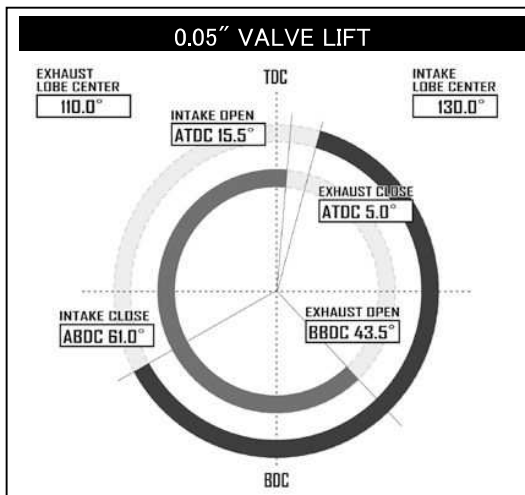
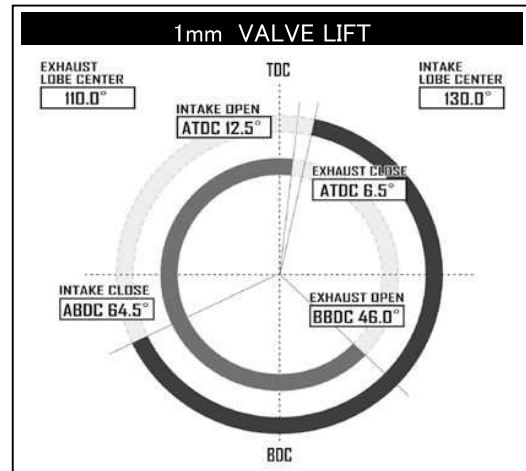
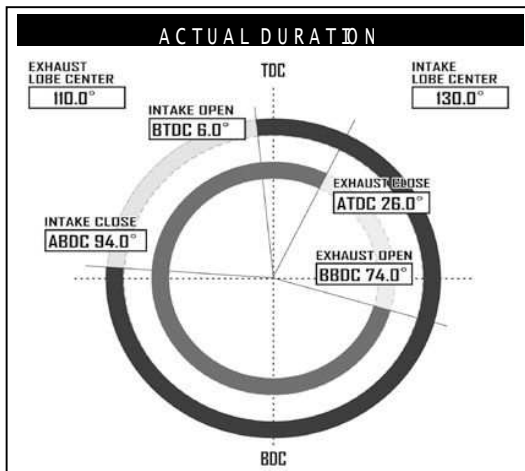
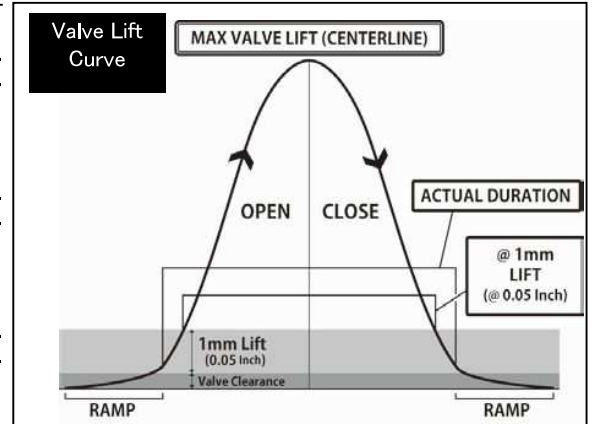
Values shown are, from start to the end of actual duration. (Excluding the ramp values)

CAM TIMING		OPENS(°)		CLOSES(°)		TOTAL DURATION(°)
at 1mm Valve Lift	IN	ATDC	12.5	ABDC	64.5	232.0
	EX	BBDC	46.0	ATDC	6.5	232.5

Values are of actual duration from start to end of 1mm value points. (Excluding ramp values)

CAM TIMING		OPENS(°)		CLOSES(°)		TOTAL DURATION(°)
at 0.05" Valve Lift	IN	ATDC	15.5	ABDC	61.0	225.5
	EX	BBDC	43.5	ATDC	5.0	228.5

Values are of actual duration from start to end of 0.05" value points. (Excluding ramp values)



REQUIRED VALVE SPRING SPEC	
NOMAL HEIGHT	50.8mm
SET LENGTH	39.6mm
LIFT LENGTH	28.1mm
COMPRESSED HEIGHT	27.1mm
SET LOAD	33.6kgf ± 5%
LIFT LOAD	81.7kgf ± 6%
TOMEI PART NUMBER	163034

REQUIRED PARTS	
PRODUCT NAME	TOMEI PART NUMBER
SOLID PIVOT	163039

TOMEI
The Engine Specialist