A1 INSTALLATION DRAWING

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FIRST ANGLE PROJECTION

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CV3 4LB
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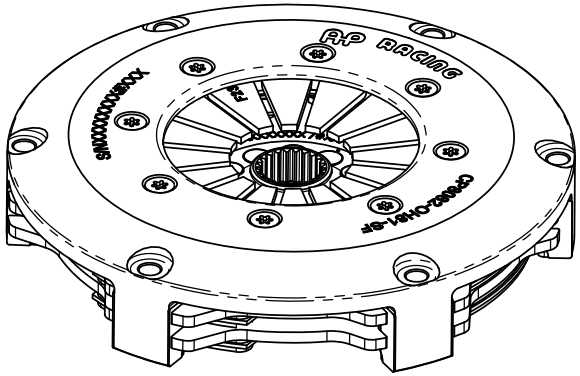
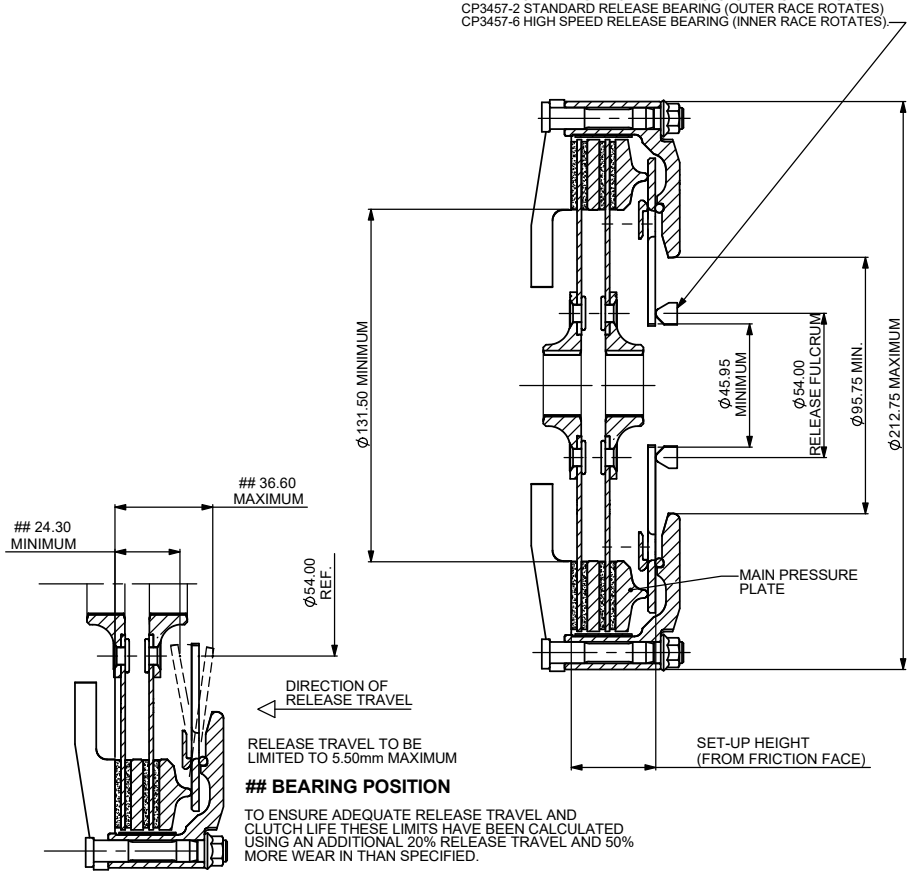
Fax: +44 (0) 24 7663 9559
e-mail: engineering@apracing.co.uk
Web site: http://www.apracing.com

CP8082, Ø184mm (7.25") CERAMETALLIC CLUTCH ASSEMBLY



RECOMMENDED RELEASE BEARING :-

STEEL CAGED, ROUND NOSED BALL TYPE BEARING TO BE FREE OF SPRING FINGERS WHEN CLUTCH IS FULLY ENGAGED.
CP3457-2 STANDARD RELEASE BEARING (OUTER RACE ROTATES)
CP3457-6 HIGH SPEED RELEASE BEARING (INNER RACE ROTATES).



BEARING POSITION

TO ENSURE ADEQUATE RELEASE TRAVEL AND CLUTCH LIFE THESE LIMITS HAVE BEEN CALCULATED USING AN ADDITIONAL 20% RELEASE TRAVEL AND 50% MORE WEAR IN THAN SPECIFIED.

THESE FIGURES COVER THE FULL RANGE OF CLUTCHES IN THE CP7972 FAMILY.

CP8082 CLUTCH FAMILY

MAXIMUM DYNAMIC TORQUE CAPACITY						
(Nm)	636				827	
(ft.lb)	469				610	
RELEASE LOAD						
Max. Peak New (N)	3500				3500	
Max. Peak Worn (N)	4400				4400	
WEAR IN (See Note)	0.75				0.75	
Set Up Height New	32.27 30.52				33.11 30.16	
Set Up Height Worn - MAX	34.78				35.19	
(Set Up Height is caluclated from the flywheel friction face.)						
Release Ratio	3.31				3.96	
Estimated Assembly Mass (Inc. 4 paddle driven plate) = 3.55 Kg						
Estimated Assembly Inertia (Inc. 4 paddle driven plate) = 0.02009 Kgm²						
Estimated Driven Plate Inertia (4 paddle driven plate) = 0.003567 Kgm²						

PERFORMANCE SUFFIX	CH	OH	NH	TH	CE	OE
For Reference						
Diaphragm Spring Rate	CRV	ORA	GRN	TGY	CRV	ORA
Clutch Ratio	HiR	HiR	HiR	HiR	EHR	EHR

MATERIAL SUFFIX	DRIVE PLATE MATERIAL	DRIVE PLATE THICKNESS	
81	CERAMETALLIC	6.00mm	

FLYWHEEL TYPE		
	SUFFIX	COMMENTS
FLAT FLYWHEEL	FF	N/A
STEPPED FLYWHEEL	SF	FOR INSTALLATION DATA SEE SHEET 2

Sample AP Racing Part No. **CP8082-CH81-SF**

WEAR IN
THIS CLUTCH HAS BEEN DESIGNED FOR THE WEAR IN INDICATED ABOVE,
DRIVEN PLATE THICKNESS NEW: 6.00mm Nominal
DRIVEN PLATE THICKNESS WORN : 5.63mm Minimum Worn
FOR DRIVEN PLATE DETAILS SEE SHEET 3

Issue No.	Alterations Date & No.	Particulars	Zone	Initials
1	15/11/10 C3974	FIRST ISSUE	#	JG
2	20/02/19 C5206_05	SHEET 3 CP8405-A036H WAS CP7972-A036H CP8401-A008 & A029 DRIVE PLATES DELETED PICTORIAL UPDATE OF 6 PADLE DRIVE PLATE	B12 D10	BJP

SCALE 1:1	SHEET 1 OF 3
DRAWN	Jeremy Govan
APPROVED	
DERIVED FROM	CP7972CD

TITLE

Ø184mm (7,25") TWIN PLATE CLUTCH ASSEMBLY

DRG NO. CP8082CD

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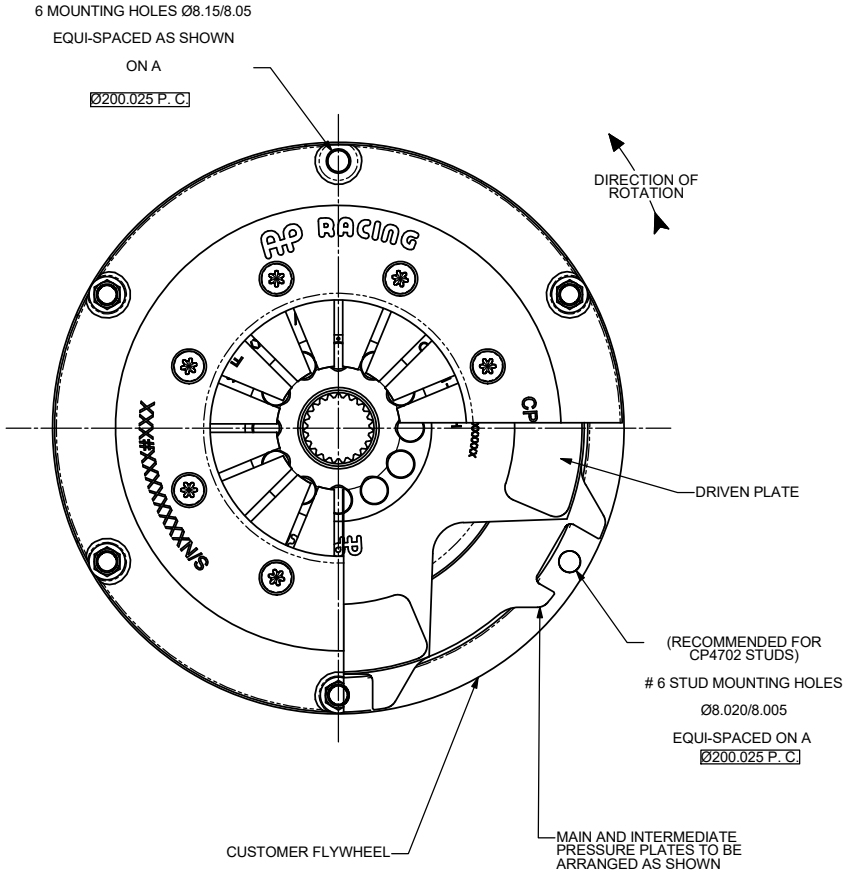
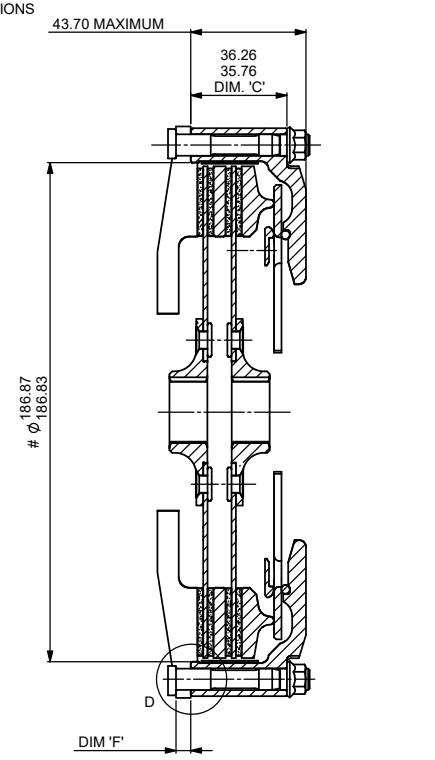
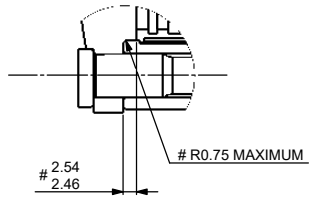
FLYWHEEL DIMENSIONS

STEPPED FLYWHEEL SUFFIX -SF





DETAIL D SCALE 2 : 1



RECOMMENDED CLUTCH MOUNTING :

(FOR ALL TYPES OF ASSEMBLY)
M8 x 1.0, CP4702 FAMILY STUD AND K-LOCK NUT.
TIGHTENING TORQUE : 19Nm (14 ft.lb)

LENGTH OF STUD REQUIRED TO BE CALCULATED THUS :

STUD LENGTH =
DIMENSIONS 'C' + 'F' + NUT

THIS CALCULATED LENGTH TO BE ROUNDED UP TO THE NEXT AVAILABLE STANDARD STUD LENGTH.

SUGGESTED FLYWHEEL MATERIAL:

0.35/0.45% CARBON STEEL. BRINELL 200 MIN. OR SUITABLE MATERIAL FOR HIGH RPM.
FRICTION FACE TO BE FINE TURNED AND GROUND SMOOTH AND FLAT. RUN OUT AT R77.2, ≤0.08 WHEN ASSEMBLED TO CRANKSHAFT.

Issue No.	Alterations: Date & No.	Alterations: Particulars	Zone	Initials
-	-	SEE SHEET 1 FOR ISSUE INFORMATION.	-	-

SCALE 1:1	SHEET 2 OF 3
DRAWN	Jeremy Govan
APPROVED	
DERIVED FROM	CP7972CD

TITLE

Ø184mm (7,25") TWIN PLATE CLUTCH ASSEMBLY

DRG NO. CP8082CD

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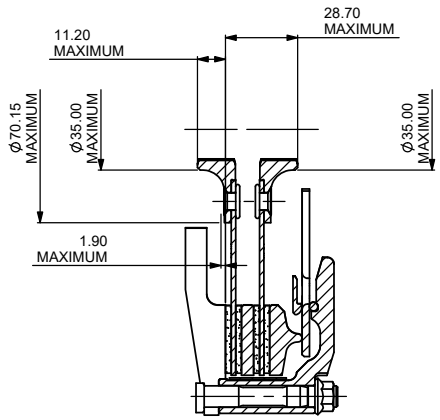
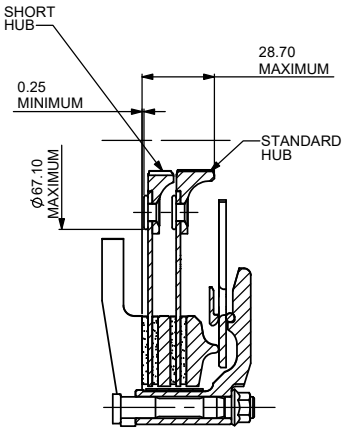
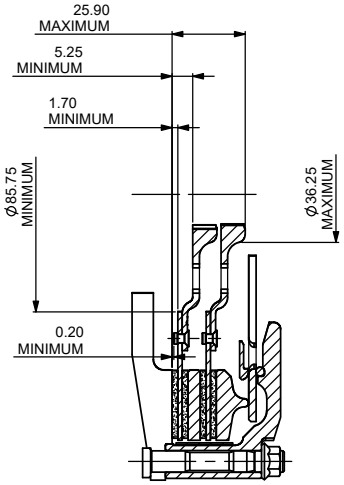


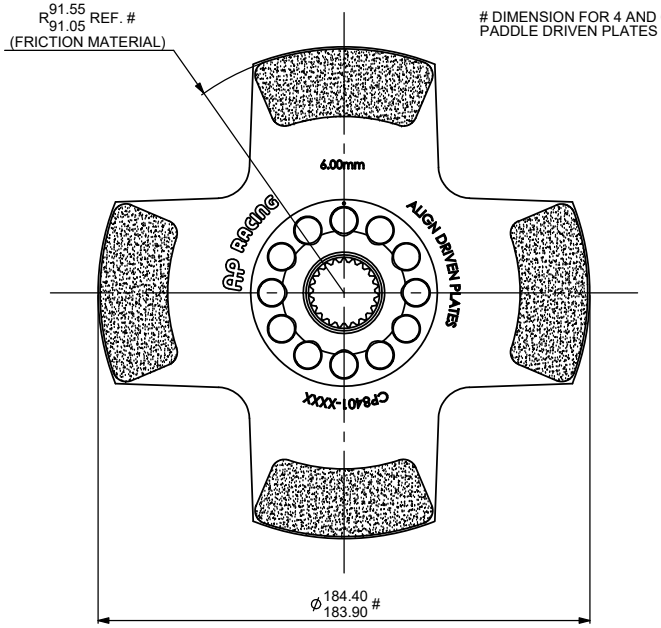
BACK TO BACK DRIVEN PLATES



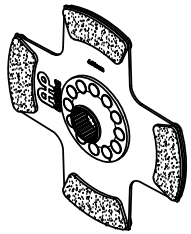
REDUCED OFFSET DRIVEN PLATES



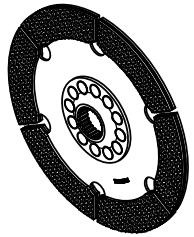
NESTED TYPE DRIVEN PLATES



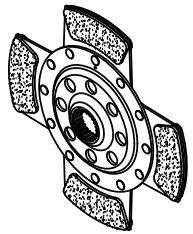
DIMENSION FOR 4 AND 6 PADDLE DRIVEN PLATES



4 PADDLE DRIVEN PLATES (1:2 SCALE)



6 PADDLE DRIVEN PLATES (1:2 SCALE)



4 PADDLE NESTED TYPE DRIVEN PLATES (1:2 SCALE)

DRIVEN PLATE DETAILS

BACK TO BACK TYPE			REDUCED OFFSET TYPE				NESTED TYPE			
PART NUMBER (4 PADDLE)	NUMBER REQUIRED	SPLINE	PART NUMBER		NUMBER REQUIRED	SPLINE	PART NUMBER		NUMBER REQUIRED	
CP8401-A036H	2	1.00" x 23T	CP8401-A036H	STANDARD HUB	1	1.00" x 23T	CP8405-A036H		2	1.00" x 23T
			CP8401-G036H	SHORT HUB	1	1.00" x 23T				
6 PADDLE										
CP8601-A036H	2	1.00" x 23T	CP8601-A036H	STANDARD HUB	1	1.00" x 23T				
			CP8601-G036H	SHORT HUB	1	1.00" x 23T				

SCALE 1:1	SHEET 3 OF 3
DRAWN	Jeremy Govan
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