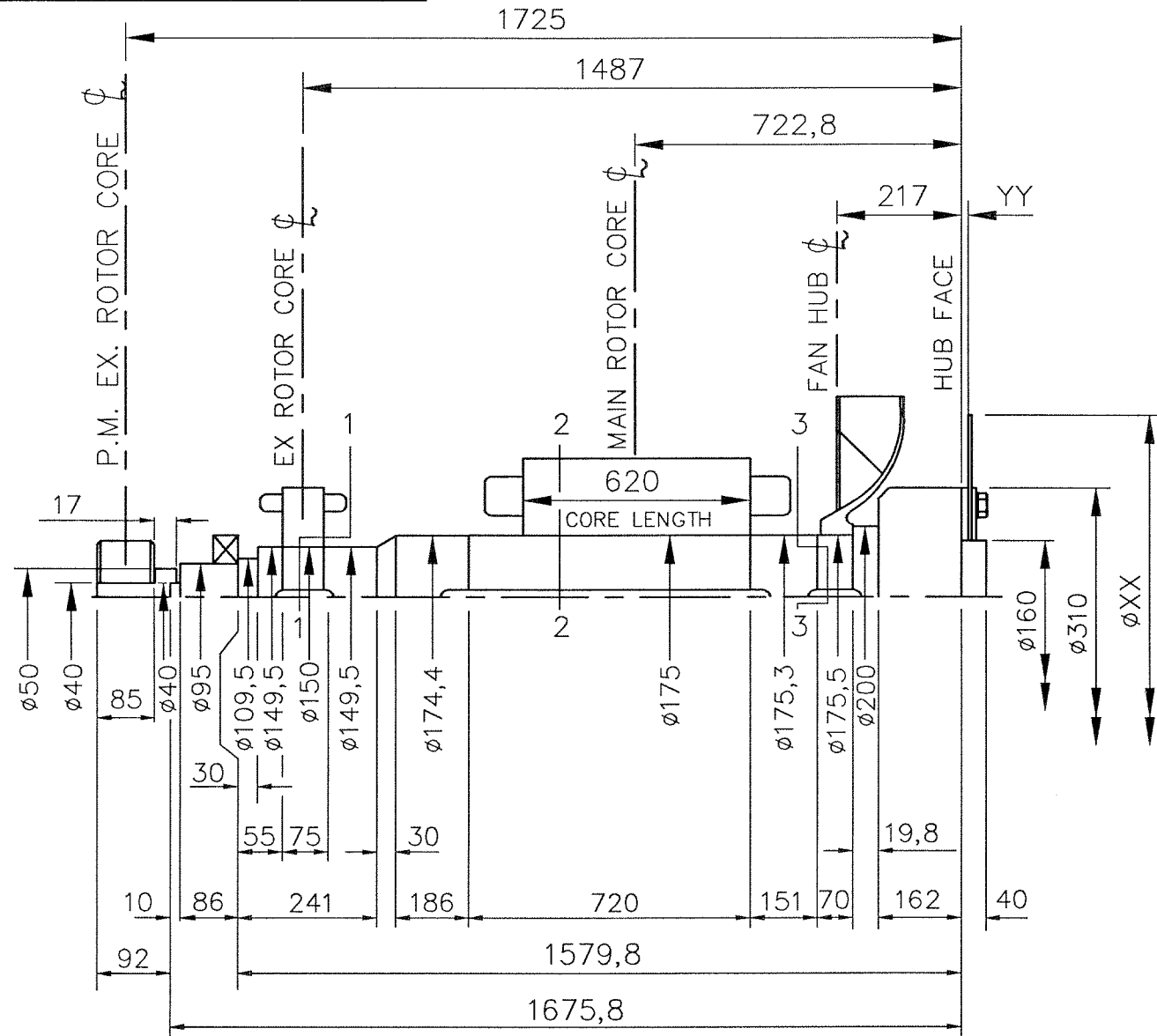


DL15-12971

ISSUE A

IF IN DOUBT-ASK
DO NOT SCALE

FIRST W.O.



NOTES!

SHAFT STIFFNESS:-

THE STIFFNESS OF THE SHAFT BETWEEN THE MAIN ROTOR CORE ϕ AND THE COUPLING HUB FACE IS $130,38 \times 10^6 \text{ kgcm/radian}$ (STIFFENING EFFECT OF MAIN ROTOR CORE IS NOT INCLUDED IN THIS FIGURE)

SHAFT MATERIAL:-

STEEL - 080M40 TO BS970 PART 1 (APPROVED BY MARINE AUTHORITIES WHEN APPROPRIATE).

MAXIMUM RECOMMENDED VIBRATORY STRESS LEVEL IN THE SHAFT IS $34,47 \times 10^6 \text{ N/m}^2$ FOR A SPEED RANGE OF 0,95 TO 1,1 x NOMINAL SPEED, AND $68,94 \times 10^6 \text{ N/m}^2$ FOR RUN THROUGH CONDITIONS, FOR INDUSTRIAL MACHINES. FOR MARINE AUTHORITIES, THEIR APPROPRIATE RULES WILL APPLY.

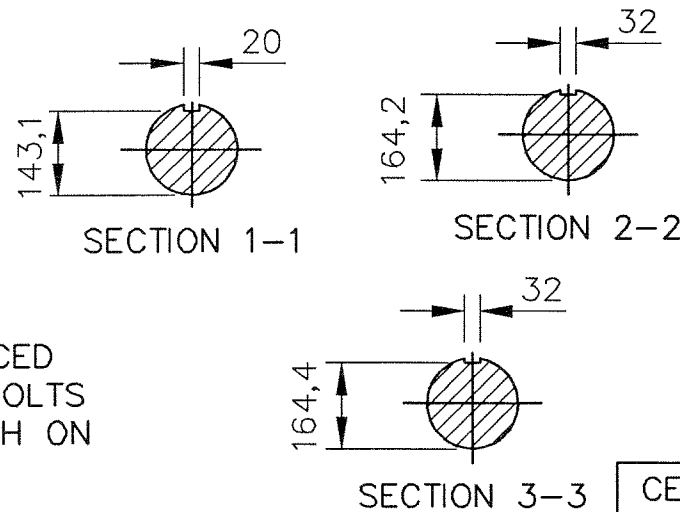
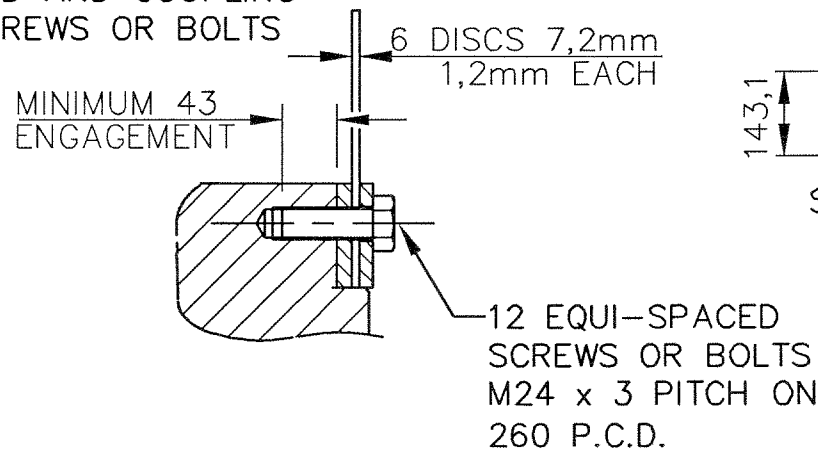
NEWAGE INTERNATIONAL LTD. SHOULD BE NOTIFIED OF ANY ROTORS NOT COMPLYING WITH THESE RULES.

NEWAGE INTERNATIONAL LTD. BALANCE ROTORS TO COMPLY WITH INTERNATIONAL STD. I.S.O. 1940 GRADE 2,5 AND B.S. 6861 PART 1 GRADE 2,5 .

FOR UNBALANCED MAGNETIC PULL (U.M.P.) FORCES REFER TO GENERATOR MANUAL.

COMPONENT	Wt kg	WR ² kgm ²	COUPLING SAE No	COUPLING DIMEN's XX YY	COUPLING ASSEMBLY WEIGHT kg	COUPLING STIFFNESS 6-PLATES kgcm/rad	COUPLING DISC WR ² kg m ²
EX.ROTOR	46,791	0,7758					
MAIN ROTOR	1109,860	49,1190					
FAN	28,800	1,6520					
SHAFT	301,114	1,1282	18	572 16	24,5	1592×10^6	0,590
HUB	53,533	0,8846	21	673 00	23,1	1468×10^6	1,135
P.MAG.ROTOR	6,970	0,0190	24	733 00	26,84	1428×10^6	1,598
STUB SHAFT	0,929	0,0003					
TOTAL	1547,997	53,5789					

SECTION THRO' SHAFT END AND COUPLING SCREWS OR BOLTS



CONVERSION FACTORS

TO CONVERT	TO	DIVIDE BY
kg	lb	0,453592
kg m ²	lb ft ²	0,04214
kgcm/rad	lbin/rad	1,1521246
N/m ²	lbf/in ²	6894,76

4/7225/03	A	AV	22:04:04	ORIGINAL ISSUE
MOD'N	ISSUE	DRAWN	DATE	ALTERATION

CERTIFIED PRINT (ONLY IF SIGNED)	P7D 6-POLE 1 BEARING MOMENTS OF INERTIA AND SHAFT DETAILS
BY	
DATE	
DRAWN AV 22:04:04	
CHECK	22-04-04
APPR'D	22/4/4

NEWAGE INTERNATIONAL Ltd.
STAMFORD, ENGLAND.

SCALE NTS (SHEET 1:10)	FIRST W.O.	UNIT OF MEASUREMENT MILLIMETRES (mm)	ISSUE A
DL15-12971			