

The user of this spreadsheet shall input data into the relevant yellow boxes on this worksheet and on all of the other relevant worksheets

Note: The disclaimer on the first worksheet applies to all tables in this workbook

Rig Manufacturer :	<b>TESCAR</b>	Rig Type & Serial No.	<b>CF3 CFA</b>	<b>#3169</b>
Operation mode:	<b>ESP100 / Supporto BASSO</b>	Date:	<b>23/07/2018</b>	
Completed by:	<b>AM</b>	Checked by:	<b>LF</b>	

Main Components - Slewing:							
Item	Mass (kg)	Weight (kN)	X - Coordinate	Y - Coordinate	Moment Mx (kNm)	Moment My (kNm)	
UPPER WORKS (Slewing)	Mast Assembly	1,450	14	0.00	1.42	-20	0
	Cathead	105	1	0.00	1.42	-1	0
	Support	630	6	0.00	0.69	-4	0
	Hydraulic cylinders	350	3	0.00	1.25	-4	0
LOWER WORKS (Slewing)	Base Machine	4,500	44	0.00	-0.30	13	0
						0	0
						0	0
						0	0
SUSPENDED EQUIPMENT CONNECTED TO CROWD SYSTEM (Slewing)	Auger	925	9	0.00	2.12	-19	0
	Rotary Head	400	4	0.00	2.12	-8	0
	Kit injection CFA	640	6	0.00	2.12	-13	0
						0	0
COUNTER-WEIGHT (Slewing)	Counterweight	700	7	0.00	-1.10	8	0
						0	0
OTHER/OTHER SUSPENDED EQUIPMENT (Slewing)						0	0
						0	0
UPPER WORKS	2,535	25	0.00	1.22	-30	0	
LOWER WORKS	4,500	44	0.00	-0.30	13	0	
SUSPENDED EQUIPMENT CONNECTED TO CROWD SYSTEM	1,965	19	0.00	2.12	-41	0	
COUNTERWEIGHT	700	7	0.00	-1.10	8	0	
OTHER	0	0	0.00	0.00	0	0	
SLEWING TOTAL/RESULTANT (with $\theta=0$ )	9,700	95	0.00	0.53	-50	0	

Foot Pads - Slewing :							
Description	Bearing Area	Max. Pad Loading	X - Coordinate	Y - Coordinate	Actual Shape	Actual Dimension	
Front Pad 1	m <sup>2</sup>	kN	m	m	Rectangular	None	
Front Pad 2	0.41	-160	0.00	1.42	None	None	
Rear Pad 1					None	None	
Rear Pad 2					None	None	

Forces - Slewing					
	Force	X - Coordinate	Y - Coordinate		
	kN	m	m		
Crowd System - Maximum Extraction Force (kN)	96	0.00	2.12	Must be inline with suspended equip't.	
Crowd System - Maximum Penetration Force (kN)	-15	0.00	2.12	-ve Must be inline with suspended equip't.	
Maximum Auxillary Force (kN)	10	0.00	2.12		

Main Components - Non-Slewing:							
Item	Mass (kg)	Weight (kN)	X - Coordinate	Y - Coordinate	Moment Mx (kNm)	Moment My (kNm)	
Lower Works Non-Slewing (undercarriage/tracks etc)	Tracks & Undercarriage	4,500	44	0.00	-0.08	4	0
				0.00	0.00	0	0
				0.00	0.00	0	0
NON-SLEWING TOTAL/RESULTANT (with $\theta=0$ )	4,500	44	0.00	-0.08	4	0	
TOTAL RIG MASS	14,200						

Foot Pads - Non-Slewing							
Description	Bearing Area	Max. Pad Loading	X - Coordinate	Y - Coordinate	Actual Shape	Actual Dimension	
Front Pad 1	m <sup>2</sup>	kN	m	m			
Front Pad 2							
Rear Pad 1							
Rear Pad 2							

Tracks	Slewing
Track bearing length (m)	2.30
Track pad width (m)	0.45
Distance between centrelines of tracks (m)	1.90
Can the rig slew?	
YES	

Note: The disclaimer on the first worksheet applies to all tables in this workbook



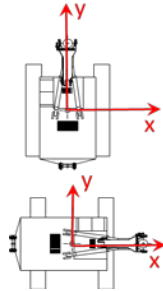
Notes

<b>TESCAR</b>	Weight / Force Applied (kN)	X - Coordinate	Y - Coordinate	Moment Mx	Moment My
<b>CF3 CFA</b>					

<b>SLEWING ACTIONS</b>					
Upper Works (slewing)	25	0.00	1.22	-30	0
Suspended Eqpt. on Crowd	19	0.00	2.12	-41	0
Counterweight (slewing)	7	0.00	-1.10	8	0
Other (slewing)	0	0.00	0.00	0	0
Lower Works (Slewing)	44	0.00	-0.30	13	0
Net Extraction Force	0	0.00	2.12	0	0
Net Penetration Force	0	0.00	2.12	0	0
Applied Auxiliary Force	0	0.00	2.12	0	0
Front Pad 1	0	0.00	1.42	0	0
Front Pad 2	0	0.00	0.00	0	0
Rear Pad 1	0	0.00	0.00	0	0
Rear Pad 2	0	0.00	0.00	0	0
Summary of Slewing Action	95	0.00	0.53	-50	0

Applied Force (kN)	Max. Allowable (kN)
0	96
0	-15
0	10

Applied Pressure (kPa)	Foot Pad Area (m2)
0	0.41
0	0.00
0	0.00
0	0.00
0	0.00
Max. Pad Pressure	0



<b>NON-SLEWING ACTIONS</b>						Applied Force (kN)	Max. Allowable (kN)	Applied Pressure (kPa)	Foot Pad Area (m2)	
Lower Works Non-Slewing	44	0.00	-0.08	4	0	0	0	0	0.00	
Front Pad 1	0	0.00	0.00	0	0	0	0	0	0.00	
Front Pad 2	0	0.00	0.00	0	0	0	0	0	0.00	
Rear Pad 1	0	0.00	0.00	0	0	0	0	0	0.00	
Rear Pad 2	0	0.00	0.00	0	0	0	0	0	0.00	
Summary of Non-slewing Actions	44	0.00	-0.08	4	0	Max. Pad Pressure		0		
Total Rig Weight (kN)	139					Track Bearing Length (m)	2.30			
Resultant of all Actions (kN)	139	0.00	0.34	-47	0	Track pad width (m)	0.45			
						Track Centerline Dist. (m)	1.90			

<b>Input Data Warning Messages</b>	<b>Notes</b>
Auxiliary Line Force OK	
Extraction Force OK	
Penetration Force OK	
Slewing Footpad Forces OK	
Non-Slewing Footpad Forces OK	

**Notes on Using this Table**

Auxiliary Line Pull -ve Z direction. Enter applied force (kN) in appropriate yellow box (G11). Note the maximum design force in the adjacent box (H11).  
 Extraction Line Pull +ve Z direction. Enter applied force (kN) in appropriate yellow box (G9). Note the maximum design force in the adjacent box (FH9).  
 Penetration Force -ve Z direction. Enter applied force (kN) in appropriate yellow box (G10) - must be negative as it imposes an upwards resultant force. Note the maximum design force in the adjacent box (H10).  
 Slewing Foot Pad Forces +ve Z direction. Enter applied total force (kN) in appropriate yellow boxes (G12 to G15). Note the maximum the machine can develop is given in the adjacent boxes.  
 Non-Slewing Foot Pad Forces -ve Z direction. Enter applied total force (kN) in appropriate yellow boxes (G20 to G23). Note the maximum the machine can develop is given in the adjacent boxes.

Fill in values in all yellow boxes appropriate for this mode -  
 Net extraction or penetration force is the applied value minus the weight of any rope / kelly / chain suspended equipment.  
 By trial and error, adjust Foot Pad Forces to eliminate "error" messages and equalise bearing pressures on both tracks and foot pads (highlighted in red boxes).  
 When applying Auxiliary or Extraction Line Pull, ensure that Penetration Force is zero.

**ONLY A COMPETENT PERSON MAY USE THIS TABLE !**

**Note: The disclaimer on the first worksheet applies to all tables in this workbook**

<b>Mode : Standing</b>							Transformation from triangular or trapezoidal to an equivalent rectangular pressure distribution under track maintaining the load centroid		
Relative Angle - Upper Body and Tracks (degrees)	Max bearing pressure L.H. track (kN/m <sup>2</sup> )	Min bearing pressure L.H. track (kN/m <sup>2</sup> )	Max bearing pressure R.H. track (kN/m <sup>2</sup> )	Min bearing pressure R.H. track (kN/m <sup>2</sup> )	Max Track loading dimensions		Equivalent Bearing		
					ecc (m)	Bearing Len. (m)	L (m)	Q (kPa)	
0	126	8	126	8	0.336	2.300	1.629	95	
15	112	9	136	12	0.323	2.300	1.653	103	
30	95	14	140	20	0.287	2.300	1.725	107	
45	79	20	137	34	0.230	2.300	1.840	107	
60	63	27	126	53	0.155	2.300	1.990	103	
75	50	35	108	76	0.068	2.300	2.164	98	
90	44	39	99	87	-0.025	2.300	2.249	95	
105	56	29	121	63	-0.119	2.300	2.062	103	
120	69	21	137	41	-0.206	2.300	1.888	109	
135	85	13	148	23	-0.281	2.300	1.739	113	
150	103	6	151	9	-0.338	2.300	1.624	113	
165	120	1	146	2	-0.374	2.300	1.552	110	
180	135	0	135	0	-0.386	2.291	1.527	101	
195	146	2	120	1	-0.374	2.300	1.552	110	
210	151	9	103	6	-0.338	2.300	1.624	113	
225	148	23	85	13	-0.281	2.300	1.739	113	
240	137	41	69	21	-0.206	2.300	1.888	109	
255	121	63	56	29	-0.119	2.300	2.062	103	
270	99	87	44	39	-0.025	2.300	2.249	95	
285	108	76	50	35	0.068	2.300	2.164	98	
300	126	53	63	27	0.155	2.300	1.990	103	
315	137	34	79	20	0.230	2.300	1.840	107	
330	140	20	95	14	0.287	2.300	1.725	107	
345	136	12	112	9	0.323	2.300	1.653	103	
Maximum Track Values							1.624	113	
							Pad Area (m <sup>2</sup> )		
Max. Slewing Foot Pads Bearing Pressure (kPa) & Equivalent Bearing Leng							0.410	0.911	0
Max. Non-Slewing Foot Pads Bearing Pressure (kPa) & Equivalent Bearing							0.000	0.000	0
<b>Maximum Equivalent Design Values</b>							1.624	113	
Eccentricity index - X direction (sideways)							0.38		
Eccentricity index - Y direction (forwards/backwards)							0.34		
Track pressure distribution warning							Track(s) lifting		
Slewing foot pad message							Slewing Foot Pad Pressure OK		
Non-Slewing foot pad message							Non-Slewing Foot Pad Pressure OK		
<b>BRE LOAD CASE ( 1 or 2 )</b>							<b>1</b>		

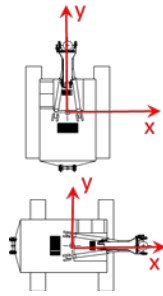


<b>TESCAR</b>	Weight / Force Applied (kN)	X - Coordinate	Y - Coordinate	Moment Mx	Moment My
<b>CF3 CFA</b>					

<b>SLEWING ACTIONS</b>					
Upper Works (slewing)	25	0.00	1.22	-30	0
Suspended Eqpt. on Crowd	19	0.00	2.12	-41	0
Counterweight (slewing)	7	0.00	-1.10	8	0
Other (slewing)	0	0.00	0.00	0	0
Lower Works (Slewing)	44	0.00	-0.30	13	0
Net Extraction Force	0	0.00	2.12	0	0
Net Penetration Force	0	0.00	2.12	0	0
Applied Auxiliary Force	0	0.00	2.12	0	0
Front Pad 1	0	0.00	1.42	0	0
Front Pad 2	0	0.00	0.00	0	0
Rear Pad 1	0	0.00	0.00	0	0
Rear Pad 2	0	0.00	0.00	0	0
<b>Summary of Slewing Action</b>	95	0.00	0.53	-50	0

Applied Force (kN)	Max. Allowable (kN)
0	96
0	-15
0	10

Applied Pressure (kPa)	Foot Pad Area (m <sup>2</sup> )
0	0.41
0	0.00
0	0.00
0	0.00



<b>NON-SLEWING ACTIONS</b>						Applied Force (kN)	Max. Allowable (kN)	Applied Pressure (kPa)	Foot Pad Area (m <sup>2</sup> )	
Lower Works Non-Slewing	44	0.00	-0.08	4	0	0	0	0	0.00	
Front Pad 1	0	0.00	0.00	0	0	0	0	0	0.00	
Front Pad 2	0	0.00	0.00	0	0	0	0	0	0.00	
Rear Pad 1	0	0.00	0.00	0	0	0	0	0	0.00	
Rear Pad 2	0	0.00	0.00	0	0	0	0	0	0.00	
<b>Summary of Non-slewing Actions</b>	44	0.00	-0.08	4	0	<b>Max. Pad Pressure 0</b>				
<b>Total Rig Weight (kN)</b>	139					Track Bearing Length (m)	2.30			
<b>Resultant of all Actions (kN)</b>	139	0.00	0.34	-47	0	Track pad width (m)	0.45			
						Track Centerline Dist. (m)	1.90			

<b>Input Data Warning Messages</b>	<b>Notes</b>
Auxiliary Line Force OK	
Extraction Force OK	
Penetration Force OK	
Slewing Footpad Forces OK	
Non-Slewing Footpad Forces OK	

**Notes on Using this Table**

Auxiliary Line Pull -ve Z direction. Enter applied force (kN) in appropriate yellow box (G11). Note the maximum design force in the adjacent box (H11).  
 Extraction Line Pull +ve Z direction. Enter applied force (kN) in appropriate yellow box (G9). Note the maximum design force in the adjacent box (FH9).  
 Penetration Force -ve Z direction. Enter applied force (kN) in appropriate yellow box (G10) - must be negative as it imposes an upwards resultant force. Note the maximum design force in the adjacent box (H10).  
 Slewing Foot Pad Forces +ve Z direction. Enter applied total force (kN) in appropriate yellow boxes (G12 to G15). Note the maximum the machine can develop is given in the adjacent boxes.  
 Non-Slewing Foot Pad Forces -ve Z direction. Enter applied total force (kN) in appropriate yellow boxes (G20 to G23). Note the maximum the machine can develop is given in the adjacent boxes.

Fill in values in all yellow boxes appropriate for this mode -  
 Net extraction or penetration force is the applied value minus the weight of any rope / kelly / chain suspended equipment.  
 By trial and error, adjust Foot Pad Forces to eliminate "error" messages and equalise bearing pressures on both tracks and foot pads (highlighted in red boxes).  
 When applying Auxiliary or Extraction Line Pull, ensure that Penetration Force is zero.

**ONLY A COMPETENT PERSON MAY USE THIS TABLE !**

**Note: The disclaimer on the first worksheet applies to all tables in this workbook**

<b>Mode : Travelling</b>								Transformation from triangular or trapezoidal to an equivalent rectangular pressure distribution under track maintaining the load centroid	
Relative Angle - Upper Body and Tracks (degrees)	Max bearing pressure L.H. track (kN/m <sup>2</sup> )	Min bearing pressure L.H. track (kN/m <sup>2</sup> )	Max bearing pressure R.H. track (kN/m <sup>2</sup> )	Min bearing pressure R.H. track (kN/m <sup>2</sup> )	Max Track loading dimensions		Equivalent Bearing		
					ecc (m)	Bearing Len. (m)	L (m)	Q (kPa)	
0	126	8	126	8	0.336	2.300	1.629	95	
15	112	9	136	12	0.323	2.300	1.653	103	
30	95	14	140	20	0.287	2.300	1.725	107	
45	79	20	137	34	0.230	2.300	1.840	107	
60	63	27	126	53	0.155	2.300	1.990	103	
75	50	35	108	76	0.068	2.300	2.164	98	
90	44	39	99	87	-0.025	2.300	2.249	95	
105	56	29	121	63	-0.119	2.300	2.062	103	
120	69	21	137	41	-0.206	2.300	1.888	109	
135	85	13	148	23	-0.281	2.300	1.739	113	
150	103	6	151	9	-0.338	2.300	1.624	113	
165	120	1	146	2	-0.374	2.300	1.552	110	
180	135	0	135	0	-0.386	2.291	1.527	101	
195	146	2	120	1	-0.374	2.300	1.552	110	
210	151	9	103	6	-0.338	2.300	1.624	113	
225	148	23	85	13	-0.281	2.300	1.739	113	
240	137	41	69	21	-0.206	2.300	1.888	109	
255	121	63	56	29	-0.119	2.300	2.062	103	
270	99	87	44	39	-0.025	2.300	2.249	95	
285	108	76	50	35	0.068	2.300	2.164	98	
300	126	53	63	27	0.155	2.300	1.990	103	
315	137	34	79	20	0.230	2.300	1.840	107	
330	140	20	95	14	0.287	2.300	1.725	107	
345	136	12	112	9	0.323	2.300	1.653	103	
<b>Maximum Track Values</b>							1.624	113	
							Pad Area (m <sup>2</sup> )		
Max. Slewing Foot Pads Bearing Pressure (kPa) & Equivalent Bearing Leng							0.410	0.911	0
Max. Non-Slewing Foot Pads Bearing Pressure (kPa) & Equivalent Bearing							0.000	0.000	0
<b>Maximum Equivalent Design Values</b>							1.624	113	
Eccentricity index - X direction (sideways)					<b>0.38</b>				
Eccentricity index - Y direction (forwards/backwards)					<b>0.34</b>				
Track pressure distribution warning					<b>Track(s) lifting</b>				
Slewing foot pad message					<b>Slewing Foot Pad Pressure OK</b>				
Non-Slewing foot pad message					<b>Non-Slewing Foot Pad Pressure OK</b>				
<b>BRE LOAD CASE ( 1 or 2 )</b>								<b>1</b>	



<b>TESCAR</b>	Weight / Force Applied (kN)	X - Coordinate	Y - Coordinate	Moment Mx	Moment My
<b>CF3 CFA</b>					

<b>SLEWING ACTIONS</b>					
Upper Works (slewing)	25	0.00	1.22	-30	0
Suspended Eqpt. on Crowd	19	0.00	2.12	-41	0
Counterweight (slewing)	7	0.00	-1.10	8	0
Other (slewing)	0	0.00	0.00	0	0
Lower Works (Slewing)	44	0.00	-0.30	13	0
Net Extraction Force	0	0.00	2.12	0	0
Net Penetration Force	0	0.00	2.12	0	0
Applied Auxiliary Force	10	0.00	2.12	-21	0
Front Pad 1	0	0.00	1.42	0	0
Front Pad 2	0	0.00	0.00	0	0
Rear Pad 1	0	0.00	0.00	0	0
Rear Pad 2	0	0.00	0.00	0	0
<b>Summary of Slewing Action</b>	105	0.00	0.68	-71	0

Applied Force (kN)	Max. Allowable (kN)
0	96
10	10

Applied Pressure (kPa)	Foot Pad Area (m <sup>2</sup> )
0	0.41
0	0.00
0	0.00
0	0.00

Max. Pad Pressure 0

Handling

<b>NON-SLEWING ACTIONS</b>						Applied Force (kN)	Max. Allowable (kN)	Applied Pressure (kPa)	Foot Pad Area (m <sup>2</sup> )	
Lower Works Non-Slewing	44	0.00	-0.08	4	0	0	0	0	0.00	
Front Pad 1	0	0.00	0.00	0	0	0	0	0	0.00	
Front Pad 2	0	0.00	0.00	0	0	0	0	0	0.00	
Rear Pad 1	0	0.00	0.00	0	0	0	0	0	0.00	
Rear Pad 2	0	0.00	0.00	0	0	0	0	0	0.00	
<b>Summary of Non-slewing Actions</b>	44	0.00	-0.08	4	0	Max. Pad Pressure 0				
<b>Total Rig Weight (kN)</b>	139					Track Bearing Length (m)	2.30			
<b>Resultant of all Actions (kN)</b>	149	0.00	0.46	-68	0	Track pad width (m)	0.45			
						Track Centerline Dist. (m)	1.90			

<b>Input Data Warning Messages</b>	<b>Notes</b>
Auxiliary Line Force OK	
Extraction Force OK	
Penetration Force OK	
Slewing Footpad Forces OK	
Non-Slewing Footpad Forces OK	

**Notes on Using this Table**

Auxiliary Line Pull +ve Z direction. Enter applied force (kN) in appropriate yellow box (G11). Note the maximum design force in the adjacent box (H11).  
 Extraction Line Pull +ve Z direction. Enter applied force (kN) in appropriate yellow box (G9). Note the maximum design force in the adjacent box (FH9).  
 Penetration Force -ve Z direction. Enter applied force (kN) in appropriate yellow box (G10) - must be negative as it imposes an upwards resultant force. Note the maximum design force in the adjacent box (H10).  
 Slewing Foot Pad Forces +ve Z direction. Enter applied total force (kN) in appropriate yellow boxes (G12 to G15). Note the maximum the machine can develop is given in the adjacent boxes.  
 Non-Slewing Foot Pad Forces -ve Z direction. Enter applied total force (kN) in appropriate yellow boxes (G20 to G23). Note the maximum the machine can develop is given in the adjacent boxes.

Fill in values in all yellow boxes appropriate for this mode -  
 Net extraction or penetration force is the applied value minus the weight of any rope / kelly / chain suspended equipment.  
 By trial and error, adjust Foot Pad Forces to eliminate "error" messages and equalise bearing pressures on both tracks and foot pads (highlighted in red boxes).  
 When applying Auxiliary or Extraction Line Pull, ensure that Penetration Force is zero.

**ONLY A COMPETENT PERSON MAY USE THIS TABLE !**

**Note: The disclaimer on the first worksheet applies to all tables in this workbook**

<b>Mode : Handling</b>								Transformation from triangular or trapezoidal to an equivalent rectangular pressure distribution under track maintaining the load centroid	
Relative Angle - Upper Body and Tracks (degrees)	Max bearing pressure L.H. track (kN/m <sup>2</sup> )	Min pressure L.H. track (kN/m <sup>2</sup> )	Max bearing pressure R.H. track (kN/m <sup>2</sup> )	Min bearing pressure R.H. track (kN/m <sup>2</sup> )	Max Track loading dimensions		Equivalent Bearing		
					ecc (m)	Bearing Len. (m)	L (m)	Q (kPa)	
0	159	0	159	0	0.455	2.085	1.390	119	
15	135	0	176	0	0.439	2.133	1.422	132	
30	109	0	182	0	0.391	2.277	1.518	137	
45	85	8	178	17	0.315	2.300	1.670	135	
60	64	18	162	45	0.216	2.300	1.868	128	
75	47	27	135	79	0.100	2.300	2.099	117	
90	38	34	115	102	-0.024	2.300	2.253	111	
105	51	23	149	66	-0.148	2.300	2.005	123	
120	69	13	175	33	-0.263	2.300	1.774	134	
135	90	3	190	5	-0.362	2.300	1.576	143	
150	116	0	195	0	-0.438	2.135	1.423	146	
165	145	0	188	0	-0.486	1.992	1.328	141	
180	171	0	171	0	-0.502	1.943	1.295	128	
195	188	0	145	0	-0.486	1.992	1.328	141	
210	195	0	116	0	-0.438	2.135	1.423	146	
225	190	5	90	3	-0.362	2.300	1.576	143	
240	175	33	69	13	-0.263	2.300	1.774	134	
255	149	66	51	23	-0.148	2.300	2.005	123	
270	115	102	38	34	-0.024	2.300	2.253	111	
285	135	79	47	27	0.100	2.300	2.099	117	
300	162	45	64	18	0.216	2.300	1.868	128	
315	178	17	85	8	0.315	2.300	1.670	135	
330	182	0	109	0	0.391	2.277	1.518	137	
345	176	0	135	0	0.439	2.133	1.422	132	
Maximum Track Values							1.423	146	
							Pad Area (m <sup>2</sup> )		
Max. Slewing Foot Pads Bearing Pressure (kPa) & Equivalent Bearing Leng							0.410	0.911	0
Max. Non-Slewing Foot Pads Bearing Pressure (kPa) & Equivalent Bearing							0.000	0.000	0
<b>Maximum Equivalent Design Values</b>							1.423	146	
Eccentricity index - X direction (sideways)							0.50		
Eccentricity index - Y direction (forwards/backwards)							0.44		
Track pressure distribution warning							Track(s) lifting		
Slewing foot pad message							Slewing Foot Pad Pressure OK		
Non-Slewing foot pad message							Non-Slewing Foot Pad Pressure OK		
<b>BRE LOAD CASE ( 1 or 2 )</b>							<b>1</b>		

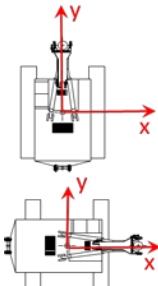


<b>TESCAR</b>	Weight / Force Applied (kN)	X - Coordinate	Y - Coordinate	Moment Mx	Moment My
<b>CF3 CFA</b>					

<b>SLEWING ACTIONS</b>					
Upper Works (slewing)	25	0.00	1.22	-30	0
Suspended Eqpt. on Crowd	19	0.00	2.12	-41	0
Counterweight (slewing)	7	0.00	-1.10	8	0
Other (slewing)	0	0.00	0.00	0	0
Lower Works (Slewing)	44	0.00	-0.30	13	0
Net Extraction Force	0	0.00	2.12	0	0
Net Penetration Force	-34	0.00	2.12	73	0
Applied Auxiliary Force	0	0.00	2.12	0	0
Front Pad 1	0	0.00	1.42	0	0
Front Pad 2	0	0.00	0.00	0	0
Rear Pad 1	0	0.00	0.00	0	0
Rear Pad 2	0	0.00	0.00	0	0
Summary of Slewing Actions	61	0.00	-0.37	22	-0

Applied Force (kN)	Max. Allowable (kN)
0.00	96
-15.00	-15
0.00	10

Applied Pressure (kPa)	Foot Pad Area (m <sup>2</sup> )
0	0.41
0	0.00
0	0.00
0	0.00
0	0.00
Max. Pad Pressure	0



<b>NON-SLEWING ACTIONS</b>					
Lower Works Non-Slewing	44	0.00	-0.08	4	0
Front Pad 1	0	0.00	0.00	0	0
Front Pad 2	0	0.00	0.00	0	0
Rear Pad 1	0	0.00	0.00	0	0
Rear Pad 2	0	0.00	0.00	0	0
Summary of Non-slewing Actions	44	0.00	-0.08	4	0
Total Rig Weight (kN)	139				
Resultant of all Actions (kN)	105	0.00	-0.25	26	0

Applied Force (kN)	Max. Allowable (kN)	Applied Pressure (kPa)	Foot Pad Area (m <sup>2</sup> )
0	0	0	0.00
0	0	0	0.00
0	0	0	0.00
0	0	0	0.00
0	0	0	0.00
Max. Pad Pressure	0		
Track Bearing Length (m)			2.30
Track pad width (m)			0.45
Track Centerline Dist. (m)			1.90

<b>Input Data Warning Messages</b>	<b>Notes</b>
Auxiliary Line Force OK	
Extraction Force OK	
Penetration Force OK	
Slewing Footpad Forces OK	
Non-Slewing Footpad Forces OK	

**Notes on Using this Table**  
 Auxiliary Line Pull +ve Z direction. Enter applied force (kN) in appropriate yellow box (G11). Note the maximum design force in the adjacent box (H11).  
 Extraction Line Pull +ve Z direction. Enter applied force (kN) in appropriate yellow box (G9). Note the maximum design force in the adjacent box (FH9).  
 Penetration Force -ve Z direction. Enter applied force (kN) in appropriate yellow box (G10) - must be negative as it imposes an upwards resultant force. Note the maximum design force in the adjacent box (H10).  
 Slewing Foot Pad Forces +ve Z direction. Enter applied total force (kN) in appropriate yellow boxes (G12 to G15). Note the maximum the machine can develop is given in the adjacent boxes.  
 Non-Slewing Foot Pad Forces -ve Z direction. Enter applied total force (kN) in appropriate yellow boxes (G20 to G23). Note the maximum the machine can develop is given in the adjacent boxes.

Fill in values in all yellow boxes appropriate for this mode -  
 Net extraction or penetration force is the applied value minus the weight of any rope / kelly / chain suspended equipment.  
 By trial and error, adjust Foot Pad Forces to eliminate "error" messages and equalise bearing pressures on both tracks and foot pads (highlighted in red boxes).  
 When applying Auxiliary or Extraction Line Pull, ensure that Penetration Force is zero.

**ONLY A COMPETENT PERSON MAY USE THIS TABLE !** **Note: The disclaimer on the first worksheet applies to all tables in this workbook**

<b>Mode : Penetrating</b>								Transformation from triangular or trapezoidal to an equivalent rectangular pressure distribution under track maintaining the load centroid	
Relative Angle - Upper Body and Tracks (degrees)	Max bearing pressure L.H. track (kN/m <sup>2</sup> )	Min pressure L.H. track (kN/m <sup>2</sup> )	Max bearing pressure R.H. track (kN/m <sup>2</sup> )	Min bearing pressure R.H. track (kN/m <sup>2</sup> )	Max Track loading dimensions ecc (m) Bearing Len. (m)		Equivalent Bearing L (m) Q (kPa)		
0	74	27	74	27	0.179	2.300	1.941	60	
15	69	26	78	30	0.172	2.300	1.956	63	
30	63	27	79	34	0.151	2.300	1.998	65	
45	56	30	77	41	0.117	2.300	2.066	65	
60	49	33	72	49	0.073	2.300	2.154	65	
75	42	38	65	58	0.022	2.300	2.257	63	
90	43	36	68	57	-0.034	2.300	2.233	64	
105	49	31	76	47	-0.089	2.300	2.122	67	
120	56	26	83	38	-0.140	2.300	2.020	69	
135	63	22	87	31	-0.184	2.300	1.931	70	
150	71	19	89	24	-0.218	2.300	1.864	70	
165	78	18	87	20	-0.239	2.300	1.821	68	
180	83	18	83	18	-0.247	2.300	1.807	65	
195	87	20	78	18	-0.239	2.300	1.821	68	
210	89	24	71	19	-0.218	2.300	1.864	70	
225	87	31	63	22	-0.184	2.300	1.931	70	
240	83	38	56	26	-0.140	2.300	2.020	69	
255	76	47	49	31	-0.089	2.300	2.122	67	
270	68	57	43	36	-0.034	2.300	2.233	64	
285	65	58	42	38	0.022	2.300	2.257	63	
300	72	49	49	33	0.073	2.300	2.154	65	
315	77	41	56	30	0.117	2.300	2.066	65	
330	79	34	63	27	0.151	2.300	1.998	65	
345	78	30	69	26	0.172	2.300	1.956	63	
Maximum Track Values							1.931	70	
Max. Slewing Foot Pads Bearing Pressure (kPa) & Equivalent Bearing Leng							0.410	0.911	0
Max. Non-Slewing Foot Pads Bearing Pressure (kPa) & Equivalent Bearing							0.000	0.000	0
<b>Maximum Equivalent Design Values</b>							1.931	70	
Eccentricity index - X direction (sideways)				<b>0.22</b>					
Eccentricity index - Y direction (forwards/backwards)				<b>0.21</b>					
Track pressure distribution warning				<b>None</b>					
Slewing foot pad message				<b>Slewing Foot Pad Pressure OK</b>					
Non-Slewing foot pad message				<b>Non-Slewing Foot Pad Pressure OK</b>					
<b>BRE LOAD CASE ( 1 or 2 )</b>								<b>2</b>	



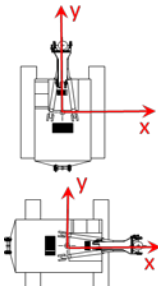
<b>TESCAR</b>	Weight / Force Applied (kN)	X - Coordinate	Y - Coordinate	Moment Mx	Moment My
<b>CF3 CFA</b>					

<b>SLEWING ACTIONS</b>					
Upper Works (slewing)	25	0.00	1.22	-30	0
Suspended Eqpt. on Crowd	19	0.00	2.12	-41	0
Counterweight (slewing)	7	0.00	-1.10	8	0
Other (slewing)	0	0.00	0.00	0	0
Lower Works (Slewing)	44	0.00	-0.30	13	0
Net Extraction Force	77	0.00	2.12	-163	0
Net Penetration Force	0	0.00	2.12	0	0
Applied Auxiliary Force	0	0.00	2.12	0	0
Front Pad 1	-80	0.00	1.42	114	0
Front Pad 2	0	0.00	0.00	0	0
Rear Pad 1	0	0.00	0.00	0	0
Rear Pad 2	0	0.00	0.00	0	0
Summary of Slewing Action	92	0.00	1.08	-99	0

Applied Force (kN)	Max. Allowable (kN)
96.00	96
0.00	-15
0.00	10

Applied Pressure (kPa)	Foot Pad Area (m <sup>2</sup> )
195	0.41
0	0.00
0	0.00
0	0.00

Max. Pad Pressure 195



<b>NON-SLEWING ACTIONS</b>					
Lower Works Non-Slewing	44	0.00	-0.08	4	0
Front Pad 1	0	0.00	0.00	0	0
Front Pad 2	0	0.00	0.00	0	0
Rear Pad 1	0	0.00	0.00	0	0
Rear Pad 2	0	0.00	0.00	0	0
Summary of Non-slewing Actions	44	0.00	-0.08	4	0
Total Rig Weight (kN)	139				
Resultant of all Actions (kN)	136	0.00	0.70	-96	0

Applied Force (kN)	Max. Allowable (kN)	Applied Pressure (kPa)	Foot Pad Area (m <sup>2</sup> )
0	0	0	0.00
0	0	0	0.00
0	0	0	0.00
0	0	0	0.00
Max. Pad Pressure 0			
Track Bearing Length (m)			2.30
Track pad width (m)			0.45
Track Centerline Dist. (m)			1.90

<b>Input Data Warning Messages</b>	<b>Notes</b>
Auxiliary Line Force OK	
Extraction Force OK	
Penetration Force OK	
Slewing Footpad Forces OK	
Non-Slewing Footpad Forces OK	

**Notes on Using this Table**

Auxiliary Line Pull +ve Z direction. Enter applied force (kN) in appropriate yellow box (G11). Note the maximum design force in the adjacent box (H11).  
 Extraction Line Pull +ve Z direction. Enter applied force (kN) in appropriate yellow box (G9). Note the maximum design force in the adjacent box (FH9).  
 Penetration Force -ve Z direction. Enter applied force (kN) in appropriate yellow box (G10) - must be negative as it imposes an upwards resultant force. Note the maximum design force in the adjacent box (H10).  
 Slewing Foot Pad Forces +ve Z direction. Enter applied total force (kN) in appropriate yellow boxes (G12 to G15). Note the maximum the machine can develop is given in the adjacent boxes.  
 Non-Slewing Foot Pad Forces -ve Z direction. Enter applied total force (kN) in appropriate yellow boxes (G20 to G23). Note the maximum the machine can develop is given in the adjacent boxes.

Fill in values in all yellow boxes appropriate for this mode -  
 Net extraction or penetration force is the applied value minus the weight of any rope / kelly / chain suspended equipment.  
 By trial and error, adjust Foot Pad Forces to eliminate "error" messages and equalise bearing pressures on both tracks and foot pads (highlighted in red boxes).  
 When applying Auxiliary or Extraction Line Pull, ensure that Penetration Force is zero.

**ONLY A COMPETENT PERSON MAY USE THIS TABLE !**

**Note: The disclaimer on the first worksheet applies to all tables in this workbook**

<b>Mode : Extracting</b>							Transformation from triangular or trapezoidal to an equivalent rectangular pressure distribution under track maintaining the load centroid		
Relative Angle - Upper Body and Tracks (degrees)	Max bearing pressure L.H. track (kN/m <sup>2</sup> )	Min pressure L.H. track (kN/m <sup>2</sup> )	Max bearing pressure R.H. track (kN/m <sup>2</sup> )	Min bearing pressure R.H. track (kN/m <sup>2</sup> )	Max Track loading dimensions ecc (m) Bearing Len. (m)		Equivalent Bearing L (m) Q (kPa)		
0	226	0	226	0	0.704	1.337	0.891	170	
15	172	0	257	0	0.679	1.412	0.941	193	
30	114	0	257	0	0.607	1.630	1.087	192	
45	70	0	236	0	0.490	1.979	1.319	177	
60	41	3	206	13	0.339	2.300	1.622	155	
75	24	10	163	66	0.163	2.300	1.974	133	
90	16	14	124	108	-0.026	2.300	2.248	119	
105	26	7	179	50	-0.215	2.300	1.870	141	
120	44	0	221	0	-0.391	2.277	1.518	166	
135	76	0	256	0	-0.542	1.823	1.215	192	
150	126	0	284	0	-0.658	1.475	0.983	213	
165	193	0	289	0	-0.731	1.256	0.837	216	
180	256	0	256	0	-0.756	1.181	0.787	192	
195	289	0	193	0	-0.731	1.256	0.837	216	
210	284	0	126	0	-0.658	1.475	0.983	213	
225	256	0	76	0	-0.542	1.823	1.215	192	
240	221	0	44	0	-0.391	2.277	1.518	166	
255	179	50	26	7	-0.215	2.300	1.870	141	
270	124	108	16	14	-0.026	2.300	2.248	119	
285	163	66	24	10	0.163	2.300	1.974	133	
300	206	13	41	3	0.339	2.300	1.622	155	
315	236	0	70	0	0.490	1.979	1.319	177	
330	257	0	114	0	0.607	1.630	1.087	192	
345	257	0	172	0	0.679	1.412	0.941	193	
Maximum Track Values							0.837	216	
Max. Slewing Foot Pads Bearing Pressure (kPa) & Equivalent Bearing Leng							0.410	0.911	195
Max. Non-Slewing Foot Pads Bearing Pressure (kPa) & Equivalent Bearing							0.000	0.000	0
<b>Maximum Equivalent Design Values</b>							0.837	216	
Eccentricity index - X direction (sideways)							0.77		
Eccentricity index - Y direction (forwards/backwards)							0.66		
Track pressure distribution warning							Track(s) lifting		
Slewing foot pad message							Slewing Foot Pad Pressure OK		
Non-Slewing foot pad message							Non-Slewing Foot Pad Pressure OK		
<b>BRE LOAD CASE ( 1 or 2 )</b>							<b>2</b>		



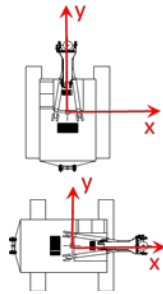


<b>TESCAR</b>	Weight / Force Applied (kN)	X - Coordinate	Y - Coordinate	Moment Mx	Moment My
<b>CF3 CFA</b>					

<b>SLEWING ACTIONS</b>					
Upper Works (slewing)	25	0.00	1.22	-30	0
Suspended Eqpt. on Crowd	19	0.00	2.12	-41	0
Counterweight (slewing)	7	0.00	-1.10	8	0
Other (slewing)	0	0.00	0.00	0	0
Lower Works (Slewing)	44	0.00	-0.30	13	0
Applied Extraction Force	0	0.00	2.12	0	0
Applied Penetration Force	0	0.00	2.12	0	0
Applied Auxiliary Force	0	0.00	2.12	0	0
Front Pad 1	0	0.00	1.42	0	0
Front Pad 2	0	0.00	0.00	0	0
Rear Pad 1	0	0.00	0.00	0	0
Rear Pad 2	0	0.00	0.00	0	0
Summary of Slewing Action	95	0.00	0.53	-50	0

Applied Force (kN)	Max. Allowable (kN)
0	96
0	-15
0	10

Applied Pressure (kPa)	Foot Pad Area (m <sup>2</sup> )
0	0.41
0	0.00
0	0.00
0	0.00
0	0.00
Max. Pad Pressure	0



<b>NON-SLEWING ACTIONS</b>						Applied Force (kN)	Max. Allowable (kN)	Applied Pressure (kPa)	Foot Pad Area (m <sup>2</sup> )
Lower Works Non-Slewing	44	0.00	-0.08	4	0	0	0	0	0.00
Front Pad 1	0	0.00	0.00	0	0	0	0	0	0.00
Front Pad 2	0	0.00	0.00	0	0	0	0	0	0.00
Rear Pad 1	0	0.00	0.00	0	0	0	0	0	0.00
Rear Pad 2	0	0.00	0.00	0	0	0	0	0	0.00
Summary of Non-slewing Actions	44	0.00	-0.08	4	0	Max. Pad Pressure		0	
Total Rig Weight (kN)	139					Track Bearing Length (m)	2.30		
Resultant of all Actions (kN)	139	0.00	0.34	-47	0	Track pad width (m)	0.45		
						Track Centreline Dist. (m)	1.90		

<b>Input Data Warning Messages</b>	<b>Notes</b>
Auxiliary Line Force OK	
Extraction Force OK	
Penetration Force OK	
Slewing Footpad Forces OK	
Non-Slewing Footpad Forces OK	

**Notes on Using this Table**

Auxiliary Line Pull +ve Z direction. Enter applied force (kN) in appropriate yellow box (G11). Note the maximum design force in the adjacent box (H11).  
 Extraction Line Pull +ve Z direction. Enter applied force (kN) in appropriate yellow box (G9). Note the maximum design force in the adjacent box (FH9).  
 Penetration Force -ve Z direction. Enter applied force (kN) in appropriate yellow box (G10) - must be negative as it imposes an upwards resultant force. Note the maximum design force in the adjacent box (H10).  
 Slewing Foot Pad Forces +ve Z direction. Enter applied total force (kN) in appropriate yellow boxes (G12 to G15). Note the maximum the machine can develop is given in the adjacent boxes.  
 Non-Slewing Foot Pad Forces -ve Z direction. Enter applied total force (kN) in appropriate yellow boxes (G20 to G23). Note the maximum the machine can develop is given in the adjacent boxes.

Fill in values in all yellow boxes appropriate for this mode -  
 Net extraction or penetration force is the applied value minus the weight of any rope / kelly / chain suspended equipment.  
 By trial and error, adjust Foot Pad Forces to eliminate "error" messages and equalise bearing pressures on both tracks and foot pads (highlighted in red boxes).  
 When applying Auxiliary or Extraction Line Pull, ensure that Penetration Force is zero.

**ONLY A COMPETENT PERSON MAY USE THIS TABLE !**

**Note: The disclaimer on the first worksheet applies to all tables in this workbook**

<b>Mode : Other</b>							Transformation from triangular or trapezoidal to an equivalent rectangular pressure distribution under track maintaining the load centroid		
Relative Angle - Upper Body and Tracks (degrees)	Max bearing pressure L.H. track (kN/m <sup>2</sup> )	Min bearing pressure L.H. track (kN/m <sup>2</sup> )	Max bearing pressure R.H. track (kN/m <sup>2</sup> )	Min bearing pressure R.H. track (kN/m <sup>2</sup> )	Max Track loading dimensions		Equivalent Bearing		
					ecc (m)	Bearing Len. (m)	L (m)	Q (kPa)	
0	126	8	126	8	0.336	2.300	1.629	95	
15	112	9	136	12	0.323	2.300	1.653	103	
30	95	14	140	20	0.287	2.300	1.725	107	
45	79	20	137	34	0.230	2.300	1.840	107	
60	63	27	126	53	0.155	2.300	1.990	103	
75	50	35	108	76	0.068	2.300	2.164	98	
90	44	39	99	87	-0.025	2.300	2.249	95	
105	56	29	121	63	-0.119	2.300	2.062	103	
120	69	21	137	41	-0.206	2.300	1.888	109	
135	85	13	148	23	-0.281	2.300	1.739	113	
150	103	6	151	9	-0.338	2.300	1.624	113	
165	120	1	146	2	-0.374	2.300	1.552	110	
180	135	0	135	0	-0.386	2.291	1.527	101	
195	146	2	120	1	-0.374	2.300	1.552	110	
210	151	9	103	6	-0.338	2.300	1.624	113	
225	148	23	85	13	-0.281	2.300	1.739	113	
240	137	41	69	21	-0.206	2.300	1.888	109	
255	121	63	56	29	-0.119	2.300	2.062	103	
270	99	87	44	39	-0.025	2.300	2.249	95	
285	108	76	50	35	0.068	2.300	2.164	98	
300	126	53	63	27	0.155	2.300	1.990	103	
315	137	34	79	20	0.230	2.300	1.840	107	
330	140	20	95	14	0.287	2.300	1.725	107	
345	136	12	112	9	0.323	2.300	1.653	103	
Maximum Track Values							1.624	113	
							Pad Area (m <sup>2</sup> )		
Max. Slewing Foot Pads Bearing Pressure (kPa) & Equivalent Bearing Leng							0.410	0.911	0
Max. Non-Slewing Foot Pads Bearing Pressure (kPa) & Equivalent Bearing							0.000	0.000	0
<b>Maximum Equivalent Design Values</b>							1.624	113	
Eccentricity index - X direction (sideways)							0.38		
Eccentricity index - Y direction (forwards/backwards)							0.34		
Track pressure distribution warning							Track(s) lifting		
Slewing foot pad message							Slewing Foot Pad Pressure OK		
Non-Slewing foot pad message							Non-Slewing Foot Pad Pressure OK		
<b>BRE LOAD CASE ( 1 or 2 )</b>							0		



**Schedule of Piling Rig Component Weights, Dimensions, Forces and Pressures**

Note: The disclaimer on the first worksheet applies to all tables in this workbook

Rig Manufacturer :	<b>TESCAR</b>	Rig Type & Serial No.	<b>CF3 CFA #3169</b>
Operation mode:	<b>ESP100 / Supporto BASSO</b>	Date:	<b>23/07/2018</b>
Completed by:	<b>AM</b>	Checked by:	<b>LF</b>

Main Components - Slewing:						
Item	Mass (kg)	Weight (kN)	X - Coordinate	Y - Coordinate	Moment Mx (kNm)	Moment My (kNm)
<b>Slewing Components Totals/Resultant (with θ=0)</b>						
UPPER WORKS	2,535	25	0.00	1.22	-30	0
LOWER WORKS	4,500	44	0.00	-0.30	13	0
SUSPENDED EQUIPMENT CONNECTED TO CROWD SYSTEM	1,965	19	0.00	2.12	-41	0
COUNTERWEIGHT	700	7	0.00	-1.10	8	0
OTHER	0	0	0.00	0.00	0	0
<b>TOTAL/RESULTANT (with θ=0)</b>	<b>9,700</b>	<b>95</b>	<b>0.00</b>	<b>0.53</b>	<b>-50</b>	<b>0</b>

Foot Pads - Slewing :						
Description (Forces must be -ve)	Bearing Area	Max. Pad Loading	X - Coordinate	Y - Coordinate	Actual Shape	Actual Dimension
	m <sup>2</sup>	kN	m	m		
Front Pad 1	0.41	-160	0.00	1.42	Rectangular	None
Front Pad 2	0.00	0.00	0.00	0.00	None	None
Rear Pad 1	0.00	0.00	0.00	0.00	None	None
Rear Pad 2	0.00	0.00	0.00	0.00	None	None

Forces - Slewing					
	Force	X - Coordinate	Y - Coordinate		
	kN	m	m		
Maximum Extraction Force (kN)	96	0.00	2.12	Must be inline with suspended equip't.	
Maximum Penetration Force (kN)	-15	0.00	2.12	-ve Must be inline with suspended equip't.	
Maximum Auxillary Force (kN)	10	0.00	2.12		

Main Components - Non-Slewing:						
Item	Mass (kg)	Weight (kN)	X - Coordinate	Y - Coordinate	Moment Mx (kNm)	Moment My (kNm)
Lower Works Non-Slewing (undercarriage/tracks etc)	Tracks & Undercarriage	4500	44	0.00	-0.08	4
				0.00	0.00	
				0.00	0.00	
<b>TOTAL/RESULTANT (with θ=0)</b>	<b>4,500</b>	<b>44</b>	<b>0.00</b>	<b>-0.08</b>	<b>4</b>	<b>0</b>
<b>TOTAL RIG MASS</b>	<b>14,200</b>					


Front Foot Pads - Non-Slewing						
Description	Bearing Area	Max. Pad Loading	X - Coordinate	Y - Coordinate	Actual Shape	Actual Dimension
	m <sup>2</sup>	kN	m	m		
Front Pad 1						
Front Pad 2						
Rear Pad 1						
Rear Pad 2						

Tracks		Slewing	
Track bearing length (m)	2.30	Can the Rig Slew?	YES
Track pad width (m)	0.45		
Distance between centrelines of tracks (m)	1.90		

MODE	Pressure Summary for Platform Design (unfactored)			BRE LOAD CASE (1 or 2)	Eccentricity Index		Winch Forces
	Equiv. Track Length (m)	Equiv. Track Width (m)	Equiv. Uniform Bearing Pressure, q <sub>eq</sub> (kPa)		Eccentricity index - X direction (sideways)	Eccentricity index - Y direction (forwards/backwards)	
Standing	1.62	0.45	113	1	0.38	0.34	0
Travelling	1.62	0.45	113	1	0.38	0.34	0
Handling	1.42	0.45	146	1	0.50	0.44	10
Penetrating	1.93	0.45	70	2	0.22	0.21	-15
Extracting	0.84	0.45	216	2	0.77	0.66	96
Other	Not Used	-	-	0	-	-	0

MODE	ERROR FOR TRACK	Auxiliary Line	ERROR MESSAGES FOR LINE FORCES	
	Zero Pressure		Extraction Force	Penetration Force
Standing	Track(s) lifting	Auxiliary Line Force OK	Extraction Force OK	Penetration Force OK
Travelling	Track(s) lifting	Auxiliary Line Force OK	Extraction Force OK	Penetration Force OK
Handling	Track(s) lifting	Auxiliary Line Force OK	Extraction Force OK	Penetration Force OK
Penetrating	None	Auxiliary Line Force OK	Extraction Force OK	Penetration Force OK
Extracting	Track(s) lifting	Auxiliary Line Force OK	Extraction Force OK	Penetration Force OK
Other	Track(s) lifting	Auxiliary Line Force OK	Extraction Force OK	Penetration Force OK

MODE	ERROR MESSAGES FOR FOOT PAD FORCES		ERROR MESSAGES FOR FOOT PAD PRESSURES	
	INPUT DATA		OUTPUT DATA	
Standing	Slewing Footpad Forces OK	Non-Slewing Footpad Forces OK	Slewing Foot Pad Pressure OK	Non-Slewing Foot Pad Pressure OK
Travelling	Slewing Footpad Forces OK	Non-Slewing Footpad Forces OK	Slewing Foot Pad Pressure OK	Non-Slewing Foot Pad Pressure OK
Handling	Slewing Footpad Forces OK	Non-Slewing Footpad Forces OK	Slewing Foot Pad Pressure OK	Non-Slewing Foot Pad Pressure OK
Penetrating	Slewing Footpad Forces OK	Non-Slewing Footpad Forces OK	Slewing Foot Pad Pressure OK	Non-Slewing Foot Pad Pressure OK
Extracting	Slewing Footpad Forces OK	Non-Slewing Footpad Forces OK	Slewing Foot Pad Pressure OK	Non-Slewing Foot Pad Pressure OK
Other	Slewing Footpad Forces OK	Non-Slewing Footpad Forces OK	Slewing Foot Pad Pressure OK	Non-Slewing Foot Pad Pressure OK

<p>Note: The disclaimer on the first worksheet applies to all tables in this workbook</p>		<p><b>Notes</b></p>
	<p> </p>	