COMPONENT SCHEDULE

DOUBLE WIDTH SPAN TOWERS WITH LADDER FRAMES TO BSEN 1004-2004 4 RUNG STARTER

Using the 3T (Through the Trap) Assembly method

INTERNAL & EXTERNAL USE

PLATFORM HEIGHT / DESCRIPTION	METRIC / IMPERIAL / CODE	2.2 7'3"	2.7 8'10"	3.2 10'6"	3.7 12'2"	4.2 13'9"	4.7 15'5"	5.2 17'1"	5.7 18'8"	6.2 20'4"	6.7 22'0"	7.2 23'7"	7.7 25'3"
1.8 m x 1.4 m SPAN	**CODE**												
150mm Adjustable Castors	2230	4	4	4	4	4	4	4	4	4	4	4	4
1.8m DoubleToeboard	2066	1	1	1	1	1	1	1	1	1	1	1	1
1.4m 4 Rung Main Frame	2002	1	1	2	1	2	2	3	2	3	3	4	3
1.4m 4 Rung Ladder Frame	2213	1	1	2	1	2	2	3	2	3	3	4	3
1.4m 3 Rung Frame	2006	-	1	-	1	-	1	-	1	-	1	-	1
1.4m 3 Rung Ladder Frame	2214	-	1	-	1	-	1	-	1	-	1	-	1
1.4m 2 Rung Frame *	2008	1	-	-	1	1	-	-	1	1	-	-	1
1.4m 2 Rung Ladder Frame *	2215	1	-	-	1	1	-	-	1	1	-	-	1
1.8m Brace	2040	6	11	11	11	11	16	16	16	16	21	21	21
2.7m Brace	2041	-	-	2	-	3	2	4	2	5	4	6	4
1.8m 3 Rung Blue Brace	2080	3	4	2	5	2	4	2	5	2	4	2	5
1.8m Main Platform	2043	1	1	1	1	1	1	1	1	1	1	1	1
1.8m Ladder Span Trap Platform	2201	1	2	2	2	2	3	3	3	3	4	4	4
Small Stabiliser (up to 8.9m)	2056	4	4	4	4	4	4	4	4	4	4	4	4
Large Stabiliser (9.4 - 12.4m)	2057	-	-	-	-	-	-	-	-	-	-	-	-
TOTAL SELF WEIGHT OF TOWER (KGS)		146	188	191	198	205	244	251	258	264	303	309	316
MAX. No. OF WORKING LEVELS		1	1	1	1	2	2	2	2	3	3	3	3

INTERNAL USE ONLY

8.2 26'11"	8.7 28'7"	9.2 30'2"	9.7 31'10"	10.2 33'6"	10.7 35'1"	11.2 36'9"	11.7 38'4"	12.2 40'8"
4	4	4	4	4	4	4	4	4
1	1	1	1	1	1	1	1	1
4	4	5	4	5	5	6	5	6
4	4	5	4	5	5	6	5	6
-	1	-	1	-	1	-	1	-
-	1	-	1	-	1	-	1	-
1	-	-	1	1	-	-	1	1
1	-	-	1	1	-	-	1	1
21	26	26	26	26	31	31	31	31
7	6	8	6	9	8	10	8	11
2	4	2	5	2	4	2	5	2
1	1	1	1	1	1	1	1	1
4	5	5	5	5	6	6	6	6
4	4	-	-	-	-	-	-	-
-	-	4	4	4	4	4	4	4
323	371	375	382	396	427	434	449	455
4	4	4	4	4	4	4	4	4

2.7 m x 1.4 m SPAN	**CODE**												
150mm Adjustable Castors	2230	4	4	4	4	4	4	4	4	4	4	4	4
2.7m DoubleToeboard	2068	1	1	1	1	1	1	1	1	1	1	1	1
1.4m 4 Rung Main Frame	2002	1	1	2	1	2	2	3	2	3	3	4	3
1.4m 4 Rung Ladder Frame	2213	1	1	2	1	2	2	3	2	3	3	4	3
1.4m 3 Rung Frame	2006	-	1	-	1	-	1	-	1	-	1	-	1
1.4m 3 Rung Ladder Frame	2214	-	1	-	1	-	1	-	1	-	1	-	1
1.4m 2 Rung Frame *	2008	1	-	-	1	1	-	-	1	1	-	-	1
1.4m 2 Rung Ladder Frame *	2215	1	-	-	1	1	-	-	1	1	-	-	1
2.7m Brace	2041	6	11	11	11	11	16	16	16	16	21	21	21
3.3m Brace	2042	-	-	2	-	3	2	4	2	5	4	6	4
2.7m 3 Rung Black Brace	2083	3	4	2	5	2	4	2	5	2	4	2	5
2.7m Main Platform	2044	1	1	1	1	1	1	1	1	1	1	1	1
2.7m Ladder Span Trap Platform	2202	1	2	2	2	2	3	3	3	3	4	4	4
Small Stabiliser (up to 8.9m)	2056	4	4	4	4	4	4	4	4	4	4	4	4
Large Stabiliser (9.4 - 12.4m)	2057	-	-	-	-	-	-	-	-	-	-	-	-
TOTAL SELF WEIGHT OF TOWER (KGS)		168	218	224	232	239	289	295	303	309	359	365	373
MAX. No. OF WORKING LEVELS		1	1	1	1	2	2	2	2	3	3	3	3

4	4	4	4	4	4	4	4	4
1	1	1	1	1	1	1	1	1
4	4	5	4	5	5	6	5	6
4	4	5	4	5	5	6	5	6
-	1	-	1	-	1	-	1	-
-	1	-	1	-	1	-	1	-
1	-	-	1	1	-	-	1	1
1	-	-	1	1	-	-	1	1
21	26	26	26	26	31	31	31	31
7	6	8	6	9	8	10	8	11
2	4	2	5	2	4	2	5	2
1	1	1	1	1	1	1	1	1
4	5	5	5	5	6	6	6	6
4	4	-	-	-	-	-	-	-
-	-	4	4	4	4	4	4	4
380	439	453	461	467	517	523	531	538
3	3	3	3	3	3	3	3	3

*** or 2 Guardrail frames Code: 2003 (but see illustration 14, page 3, before use)**

NOTES: A WORKING LEVEL ON A DOUBLE WIDTHTOWER IS TWO PLATFORMS SIDE BY SIDE WITH TOEBOARDS & DOUBLE GUARDRAILS. THE MAXIMUM LOAD ON A 600 mm WIDE PLATFORM IS 2kN/m² WHICH IS:-

a) 212 kgs EVENLY DISTRIBUTED ON A 1.8m (6'0") LONG PLATFORM. b) 324 kgs EVENLY DISTRIBUTED ON A 2.7m (8'10") LONG PLATFORM

THE MAXIMUM LOAD ON A TOWER (INCLUDING THE SELF WEIGHT OF THE TOWER) SHOULD NOT EXCEED 2500kgs (2.5 TONNE) ON TOWERS NOT USING 2 RUNG FRAMES. ON TOWERS USING 2 RUNG FRAMES, MAXIMUM LOAD ON TOWER IS 1500kg (1.5 TONNE) UNLESS ADDTIONAL SHORT BRACES HAVE BEEN ADDED. (REFER TO SUPPLIER FOR MORE INFORMATION). THE MAXIMUM HORIZONTAL FORCE WHEN USING HAND TOOLS ETC. SHOULD NOT EXCEED 30 kgs & STABILISERS MUST BE FITTED

THE ABOVE SCHEDULE INCLUDES FOR: (i) 1 WORKING LEVEL WITH DOUBLE TOEBOARDS & DOUBLE HANDRAILS AT 0.5m.And 1m

(ii) A SINGLE TRAP PLATFORM & HANDRAILS EVERY 2 m.

TO CONVERT A REST PLATFORM TO A WORKING LEVEL:

ON A 1.8m LONG DOUBLE WIDTH TOWER ADD 1 - 1.8m MAIN PLATFORM (2043) & 1 - 1.8m DOUBLE TOEBOARD SET (2066)

ON A 2.7m LONG DOUBLE WIDTH TOWER ADD 1 - 2.7m MAIN PLATFORM (2044) & 1 - 2.7m DOUBLE TOEBOARD SET (2068)

COMPONENT SCHEDULE

DOUBLE WIDTH SPAN TOWERS WITH LADDER FRAMES TO BSEN 1004-2004 5 RUNG STARTER

Using the 3T (Through the Trap) Assembly method

INTERNAL & EXTERNAL USE

PLATFORM HEIGHT DESCRIPTION	METRIC IMPERIAL	2.4 7'10"	2.9 9'6"	3.4 11'2"	3.9 12'10"	4.4 14'5"	4.9 16'0"	5.4 17'9"	5.9 19'4"	6.4 21'0"	6.9 22'8"	7.4 24'3"	7.9 25'11"
1.8 m x 1.4 m SPAN	**CODE**												
150mm Castors	2230	4	4	4	4	4	4	4	4	4	4	4	4
Adjustable Leg		4	4	4	4	4	4	4	4	4	4	4	4
1.8m DoubleToeboard	2066	1	1	1	1	1	1	1	1	1	1	1	1
1.4m 5 Rung Base Frame	2001	1	1	1	1	1	1	1	1	1	1	1	1
1.4m 5 Rung Ladder Frame	2212	1	1	1	1	1	1	1	1	1	1	1	1
1.4m 4 Rung Main Frame	2002	-	-	1	-	1	1	2	1	2	2	3	2
1.4m 4 Rung Ladder Frame	2213	-	-	1	-	1	1	2	1	2	2	3	2
1.4m 3 Rung Frame	2006	-	1	-	1	-	1	-	1	-	1	-	1
1.4m 3 Rung Ladder Frame	2214	-	1	-	1	-	1	-	1	-	1	-	1
1.4m 2 Rung Frame *	2008	1	-	-	1	1	-	-	1	1	-	-	1
1.4m 2 Rung Ladder Frame *	2215	1	-	-	1	1	-	-	1	1	-	-	1
1.8m Brace	2040	6	11	11	11	11	16	16	16	16	21	21	21
2.7m Brace	2041	3	2	4	2	5	4	6	4	7	6	8	6
1.8m 3 Rung Blue Brace	2080	-	2	-	3	-	2	-	3	-	2	-	3
1.8m Main Platform	2043	1	1	1	1	1	1	1	1	1	1	1	1
1.8m Ladder Span Trap Platform	2201	1	2	2	2	2	3	3	3	3	4	4	4
Small Stabiliser (up to 8.9m)	2056	4	4	4	4	4	4	4	4	4	4	4	4
Large Stabiliser (9.4 - 12.4m)	2057	-	-	-	-	-	-	-	-	-	-	-	-
TOTAL SELF WEIGHT OF TOWER (KGS)		151	189	196	203	209	249	254	262	269	307	314	321
MAX. No. OF WORKING LEVELS		1	1	1	1	2	2	2	2	3	3	3	3
2.7m x 1.4m SPAN	**CODE**												
150mm Adjustable Castors	2230	4	4	4	4	4	4	4	4	4	4	4	4
2.7m DoubleToeboard	2068	1	1	1	1	1	1	1	1	1	1	1	1
1.4m 5 Rung Base Frame	2001	1	1	1	1	1	1	1	1	1	1	1	1
1.4m 5 Rung Ladder Frame	2212	1	1	1	1	1	1	1	1	1	1	1	1
1.4m 4 Rung Main Frame	2002	-	-	1	-	1	1	2	1	2	2	3	2
1.4m 4 Rung Ladder Frame	2213	-	-	1	-	1	1	2	1	2	2	3	2
1.4m 3 Rung Frame	2006	-	1	-	1	-	1	-	1	-	1	-	1
1.4m 3 Rung Ladder Frame	2214	-	1	-	1	-	1	-	1	-	1	-	1
1.4m 2 Rung Frame *	2008	1	-	-	1	1	-	-	1	1	-	-	1
1.4m 2 Rung Ladder Frame *	2215	1	-	-	1	1	-	-	1	1	-	-	1
2.7m Brace	2041	6	11	11	11	11	16	16	16	16	21	21	21
3.3m Brace	2042	3	2	4	2	5	4	6	4	7	6	8	6
2.7m 3 Rung Black Brace	2083	-	2	-	3	-	2	-	3	-	2	-	3
2.7m Main Platform	2044	1	1	1	1	1	1	1	1	1	1	1	1
2.7m Ladder Span Trap Platform	2202	1	2	2	2	2	3	3	3	3	4	4	4
Small Stabiliser (up to 8.9m)	2056	4	4	4	4	4	4	4	4	4	4	4	4
Large Stabiliser (9.4 - 12.4m)	2057	-	-	-	-	-	-	-	-	-	-	-	-
TOTAL SELF WEIGHT OF TOWER (KGS)		173	222	229	237	243	293	299	307	314	363	369	377
MAX. No. OF WORKING LEVELS		1	1	1	1	2	2	2	2	3	3	3	3

INTERNAL USE ONLY

8.4 27'7"	8.9 29'2"	9.4 30'10"	9.9 32'6"	10.4 34'1"	10.9 35'9"	11.4 37'5"	11.9 39'1"	12.4 40'8"
4	4	4	4	4	4	4	4	4
4	4	4	4	4	4	4	4	4
1	1	1	1	1	1	1	1	1
1	1	1	1	1	1	1	1	1
1	1	1	1	1	1	1	1	1
3	3	4	3	4	4	5	4	5
3	3	4	3	4	4	5	4	5
-	1	-	1	-	1	-	1	-
-	1	-	1	-	1	-	1	-
1	-	-	1	1	-	-	1	1
1	-	-	1	1	-	-	1	1
21	26	26	26	26	31	31	31	31
9	8	10	8	11	10	12	10	13
-	2	-	3	-	2	-	3	-
1	1	1	1	1	1	1	1	1
4	5	5	5	5	6	6	6	6
4	4	-	-	-	-	-	-	-
-	-	4	4	4	4	4	4	4
328	366	380	387	398	432	438	445	452
4	4	4	4	4	4	4	4	4
4	4	4	4	4	4	4	4	4
1	1	1	1	1	1	1	1	1
1	1	1	1	1	1	1	1	1
1	1	1	1	1	1	1	1	1
3	3	4	3	4	4	5	4	5
3	3	4	3	4	4	5	4	5
-	1	-	1	-	1	-	1	-
-	1	-	1	-	1	-	1	-
1	-	-	1	1	-	-	1	1
1	-	-	1	1	-	-	1	1
21	26	26	26	26	31	31	31	31
9	8	10	8	11	10	12	10	13
-	2	-	3	-	2	-	3	-
1	1	1	1	1	1	1	1	1
4	5	5	5	5	6	6	6	6
4	4	-	-	-	-	-	-	-
-	-	4	4	4	4	4	4	4
384	444	457	463	472	521	527	535	542
4	4	4	4	4	4	4	4	4

*** or 2 Guardrail frames Code: 2003 (see illustration 14, page 3)**

NOTES: A WORKING LEVEL ON A DOUBLE WIDTHTOWER IS TWO PLATFORMS SIDE BY SIDE WITH TOEBOARDS & DOUBLE GUARDRAILS. THE MAXIMUM LOAD ON A 600 mm WIDE PLATFORM IS 2kN/m² WHICH IS:-

a) 212 kgs EVENLY DISTRIBUTED ON A 1.8m (6'0") LONG PLATFORM. b) 324 kgs EVENLY DISTRIBUTED ON A 2.7m (8'10") LONG PLATFORM

THE MAXIMUM LOAD ON A TOWER (INCLUDING THE SELF WEIGHT OF THE TOWER) SHOULD NOT EXCEED 2500kgs (2.5 TONNE) ON TOWERS NOT USING 2 RUNG FRAMES. ON TOWERS USING 2 RUNG FRAMES, MAXIMUM LOAD ON TOWER IS 1500kg (1.5 TONNE) UNLESS ADDTIONAL SHORT BRACES HAVE BEEN ADDED. (REFER TO SUPPLIER FOR MORE INFORMATION). THE MAXIMUM HORIZONTAL FORCE WHEN USING HAND TOOLS ETC. SHOULD NOT EXCEED 30 kgs & STABILISERS MUST BE FITTED

THE ABOVE SCHEDULE INCLUDES FOR: (i) 1 WORKING LEVEL WITH DOUBLE TOEBOARDS & DOUBLE HANDRAILS AT 0.5m.And 1m

(ii) A SINGLE TRAP PLATFORM & HANDRAILS EVERY 2 m.

TO CONVERT A REST PLATFORM TO A WORKING LEVEL:

ON A 1.8m LONG DOUBLE WIDTH TOWER ADD 1 - 1.8m MAIN PLATFORM (2043) & 1 - 1.8m DOUBLE TOEBOARD SET (2066)

ON A 2.7m LONG DOUBLE WIDTH TOWER ADD 1 - 2.7m MAIN PLATFORM (2044) & 1 - 2.7m DOUBLE TOEBOARD SET (2068)

HIRE ASSOCIATION EUROPE SUPPLIER

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HIRE INDUSTRY AWARDS
SAFETY WINNERS

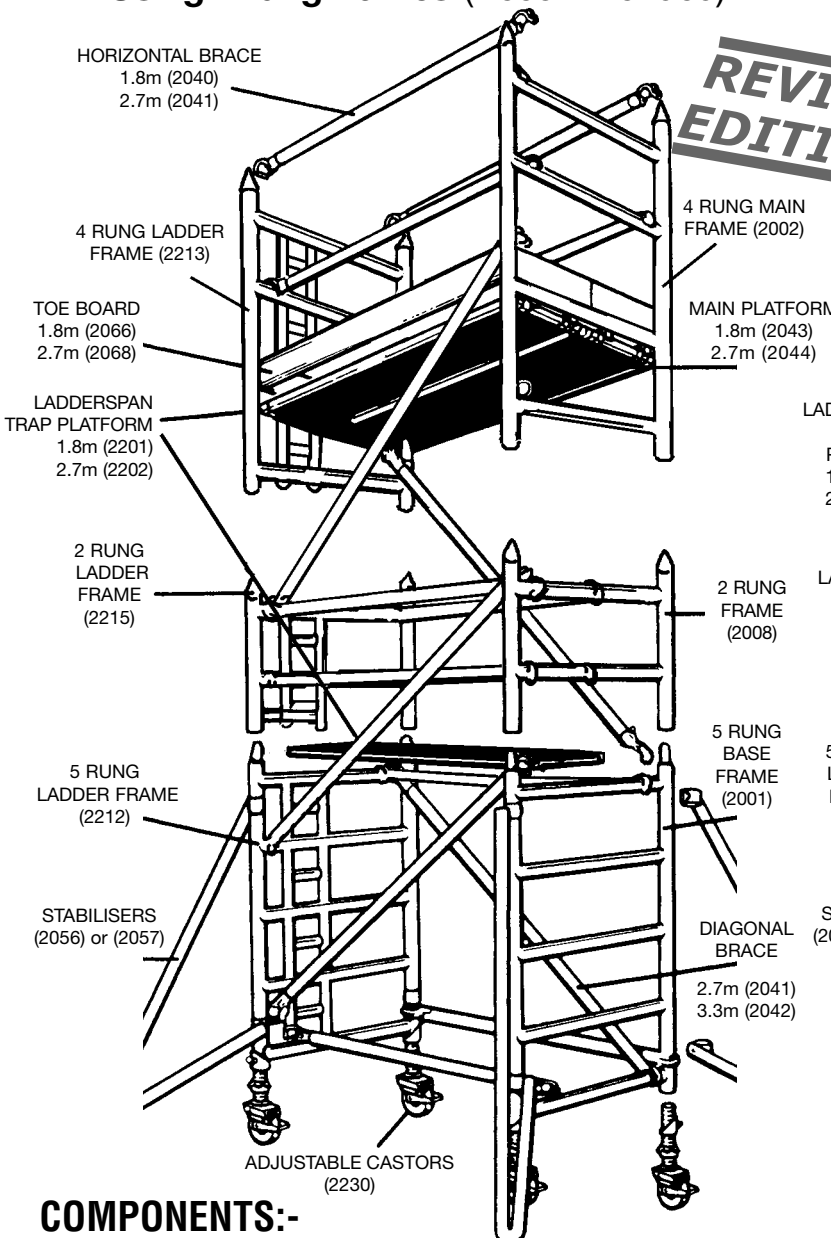
Industrial Aluminium Towers

DOUBLE WIDTH LADDERSPAN & VERTICAL LADDER ERECTION MANUAL

TO BS-EN 1004-2004

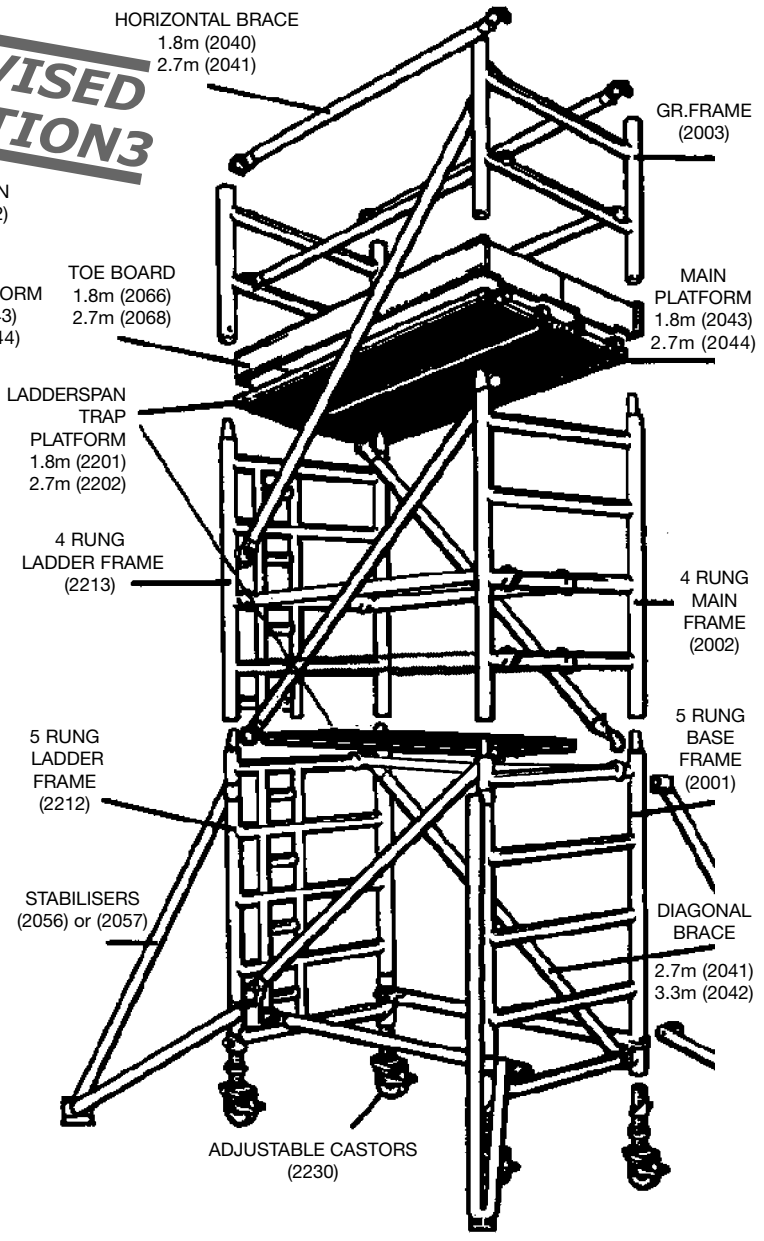
Using the 3T (Through the Trap) Assembly method

Using 2 rung frames (Recommended)



REVISED EDITION3

Using guardrail frames



COMPONENTS:-
DOUBLE WIDTH LADDERSPAN (1.8m & 2.7m LONG) WITH 5 RUNG OR 4 RUNG STARTER FRAMES

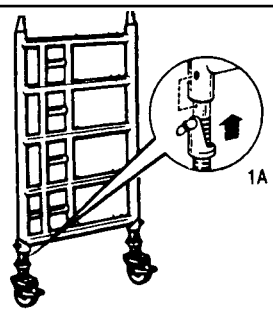
ALTO

TÜV Rheinland Product Safety

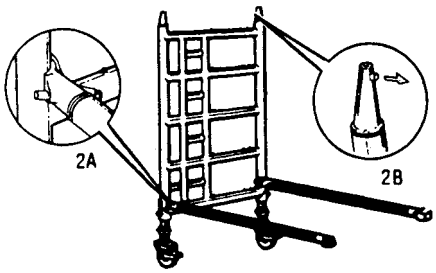
GS geprüfte Sicherheit

Distributed by:-

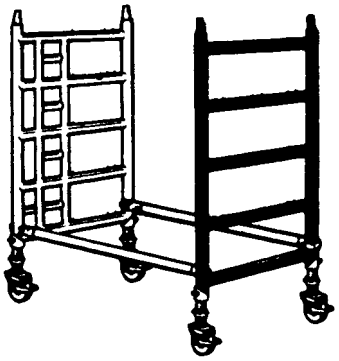
LADDER SPAN ERECTION MANUAL WITH 5 RUNG STARTER FRAMES



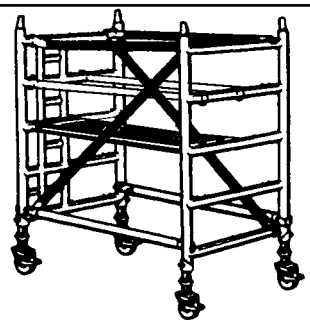
1. These towers should be erected by at least 2 competent persons. Contact your supplier for details of appropriate training. Check you have the correct equipment and it is in working order. Apply brakes and fit adjustable castors into both 5 rung frames ensuring that spring loaded pin is engaged in hole provided (see detail 1A).



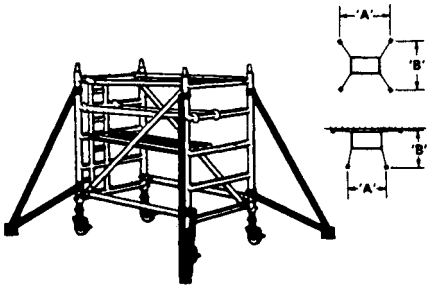
2. Make sure pegs on frame head fitting always point towards middle of tower (see detail 2B). Fit two short horizontal braces to vertical tubes of one of the frames ensuring spring loaded pin faces outwards (see detail 2A).



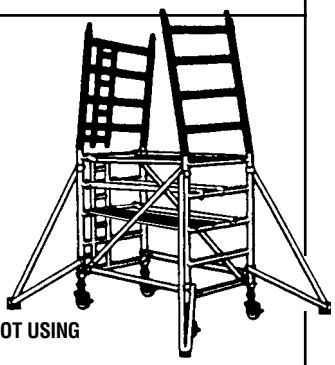
3. Fit opposite ends of short braces to other 5 rung base frame ensuring pegs on frame head fitting point towards middle of tower.



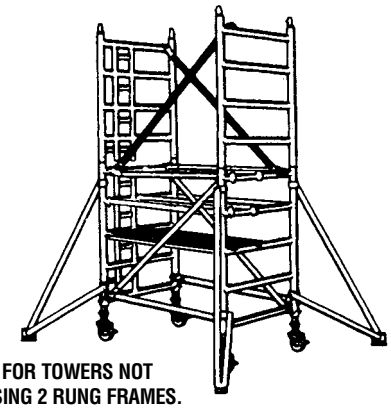
4. 1) Fit two long braces diagonally in opposite directions as close to the frame vertical tube as possible. 2) Fit a temporary platform on the third rung down from the top of the frame and, working through the trap fit short braces as temporary guardrails horizontally onto top and 2nd rung of frames between pegs provided. At this stage level the tower by adjusting collar on castors (see construction notes).



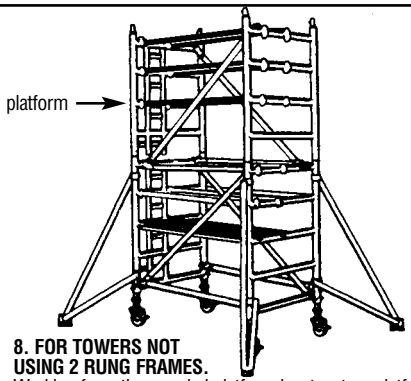
5. From the temporary platform fit an additional horizontal brace between the pegs on the far side of the top rung. Fit appropriate stabilisers (see schedule on back page) to each corner of the tower to increase the effective base dimensions A & B. They must be fitted so that when viewed from above the largest square is formed. Ensure the wing nuts are tight so that it is not possible to move stabilisers without slackening the wing nuts.



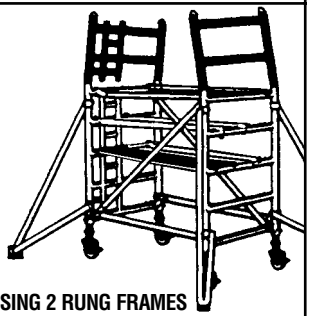
6. FOR TOWERS NOT USING 2 RUNG FRAMES.
Working from platform add a 4 rung ladder frame to the 5 rung ladder frame by locating onto head fitting with peg engaging into hole provided. Repeat the process at the other end using a 4 rung main frame.



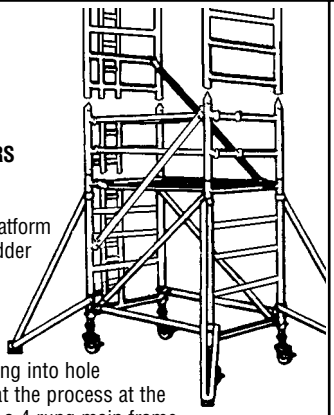
7. FOR TOWERS NOT USING 2 RUNG FRAMES.
Fit two braces diagonally in opposite directions as close to the frame vertical tubes as possible.



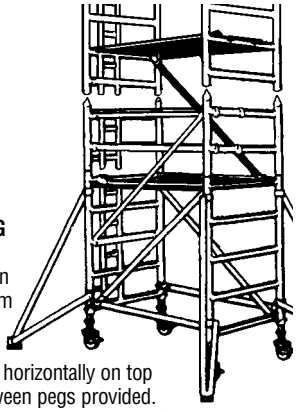
8. FOR TOWERS NOT USING 2 RUNG FRAMES.
Working from the guarded platform locate a trap platform with the trap opening adjacent to the ladder on the 3rd rung down from the top of the tower. Working through trap, fit short braces horizontally as guardrails, continue building the tower repeating the bracing pattern until the required platform height is reached. Continue onto box 12, 13 or 14 (whichever is applicable)



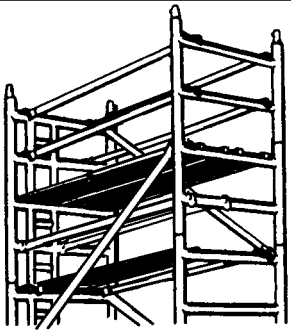
9. FOR TOWERS USING 2 RUNG FRAMES
Working from a temporary platform add a 2 rung ladder frame to the 5 rung ladder frame by locating onto head fitting with peg engaging into hole provided. Repeat the process at the other end using a rung main frame. Add a diagonal brace to the top rung of the 2 rung on one side of the tower. Remove temporary platform and relocate onto 5th rung of base frame. Fit short braces to form guardrails as before.



10. FOR TOWERS USING 2 RUNG FRAMES.
Working from platform add a 4 rung ladder frame to 2 rung ladder frame by locating onto head fitting with peg engaging into hole provided. Repeat the process at the other end using a 4 rung main frame.
Fit two braces diagonally in opposite directions as close to the frame vertical tubes as possible.

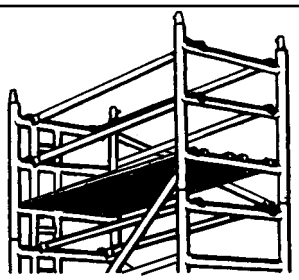


11. TOWERS USING 2 RUNG FRAMES
Fit a trap platform on third rung down from top of frame and working through trap fit short braces horizontally on top rungs of frame between pegs provided.
Still using a platform & braces to aid safe erection, continue building the tower repeating the bracing pattern until the required platform height is reached.

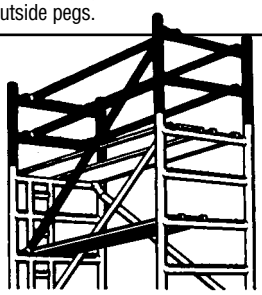


12. TOWERS FINISHING WITH 4 RUNG FRAMES.
Erect as shown up to (8 or 11), then:- Still using a platform & braces to aid safe erection fit platform on the third rung down in the same way as shown in (11). Working through the trap fit two short braces horizontally on to top rung of frames between pegs provided and two on first rung down over outside pegs.

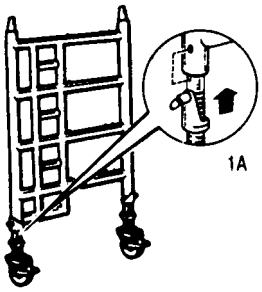
LADDER SPAN ERECTION MANUAL WITH 4 RUNG STARTER FRAMES



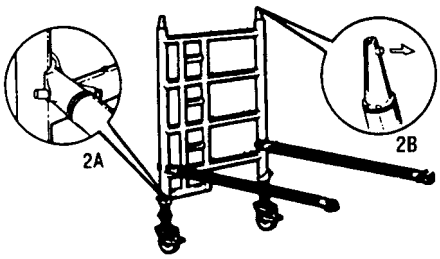
13. TOWERS FINISHING WITH 3 RUNG FRAMES
Still using a platform & braces to aid safe erection erect tower as shown up to (11). Repeat (11) but use 3 rung frame and use either blue braces or black braces provided. Fit trap platform on the third rung down in the same way as shown in (11). Working through the trap fit two short braces horizontally onto top rung of frames between pegs provided and two on first rung down over outside pegs.



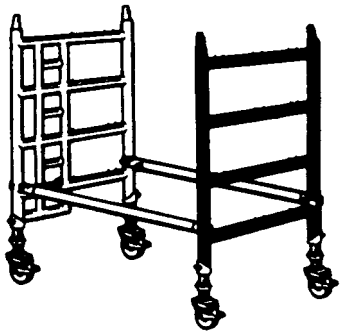
14. TOWERS FINISHING WITH GUARDRAIL FRAMES
Guardrail frames can be used at the top of the tower instead of 2 rung frames lower down, but they will need the intermediate platforms to be rearranged before forming the top platform. Using a temporary platform & braces to aid safe erection fit two G.R. frames (2 rung) by locating onto head fitting with peg engaging into hole provided. Fit two short braces horizontally onto top rungs of frames between pegs provided and two on first rung down over outside pegs. Fit one long brace diagonally from top rung of frame as close to the frame vertical tubes as possible. Relocate the top platform into its final position



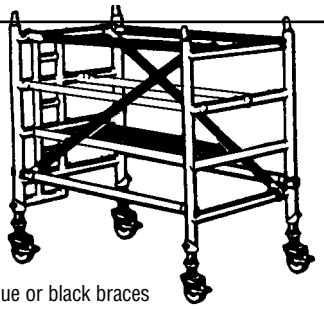
1. These towers should be erected by at least 2 competent persons. Apply brakes and fit adjustable castors into one 4 rung ladder frame and one 4 rung main frame,ensuring that spring loaded pin is engaged in hole provided (see detail 1A).



2. Make sure pegs on frame head fitting always point towards middle of tower (see detail 2B). Fit two short horizontal braces to vertical tubes of one of the frames ensuring spring loaded pin faces outwards (see detail 2A).



3. Fit opposite ends of short braces to other 4 rung frame ensuring pegs on frame head fitting point towards middle of tower.

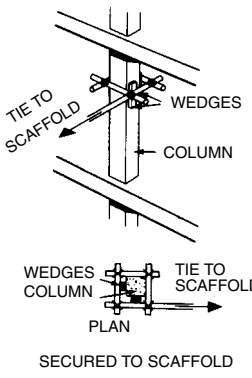


4.) Fit two blue or black braces (for a 1.8m tower fit blue and a 2.7m tower fit black) diagonally in opposite directions as close to the frame vertical tube as possible. 2) Fit a temporary platform on the third rung down from the top of the frame and working through the trap fit four short braces horizontally onto top rungs and second rungs of frames between pegs provided. At this stage level the tower by adjusting collar on castors (see construction notes). Continue as (5-14) on opposite page.

CONSTRUCTION NOTES

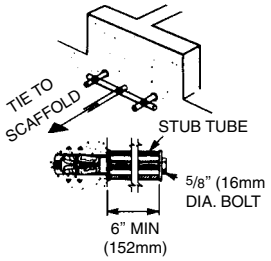
1. Follow the erection manual to ensure that the correct erection procedure is used.
2. Ensure that sufficient equipment is available to construct the tower and is in working order.
3. Do not extend castor jacks more than is necessary to level the tower. Adjustable swivel base jacks are available for use on stepped, steeply sloped or soft ground conditions.
4. Use a Spirit level to check that the tower is upright.
5. The peg on the head fitting must always point inwards.
6. Fit the first two horizontal braces to the vertical frame tube. This prevents the frame from falling over during erection and dismantling.
7. All diagonal braces are fitted as close as possible to the upright.
8. Observe all height limits (fig.5) and fit stabilisers to increase the safe working height to the tower. Towers may also be tied to a suitable rigid structure using standard scaffolding tubes and fittings (see tying in).
9. Fit toeboards to all working platforms and ensure that all platforms are adequately guarded.
10. The dismantling sequence is the reverse order of the erection process.
11. For special or unusual applications contact your supplier for further technical data sheets and expert advice.
12. During erection and dismantling any temporary platform used for building the tower, should be treated as a working platform with guard rails at 0.5m and 1.0m above platform.

TYING IN



SECURED TO SCAFFOLD

fig. A



SECURE TO EMBEDDED TIES IN CONCRETE

fig. B

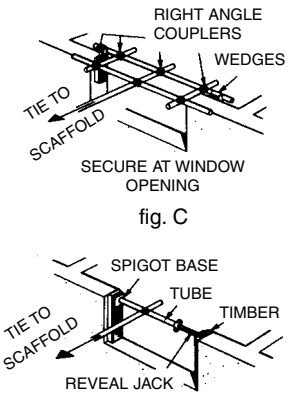


fig. C

SECURE TO REVEAL PROP. fig. D

NOTE: Arrangement shown in fig. D is considered to be a friction device and should not exceed ½ the total number of scaffold ties in any area.

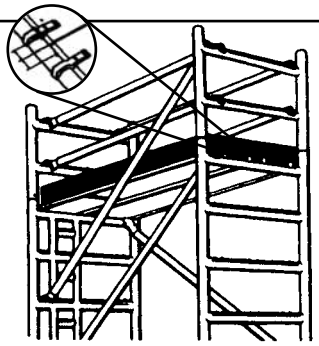
When friction devices are used the connection to the scaffold must be made onto both vertical uprights. Ties should be at no more than 4m intervals.

Beware of high winds: If high winds are forecast do not erect the tower or leave up overnight. When working on towers outdoors for long periods always listen to weather forecasts at night.

Wind-Description	Beaufort-Scale	Beaufort-No.	Speed in in mph	Speed in m/sec	
Medium Breeze	Raises dust and loose paper small branches sway.	4	13 - 18	5.5 - 8	Safe to work on the tower.
Strong Breeze	Large branches in motion, telegraph wires whistle.	6	25 - 31	11 - 14	Tie the tower onto a solid Structure. Do not work on tower
Gale Force	Twigs snap off, walking is difficult.	8	39 - 46	17 - 21	Towers should on no account be erected in these conditions.

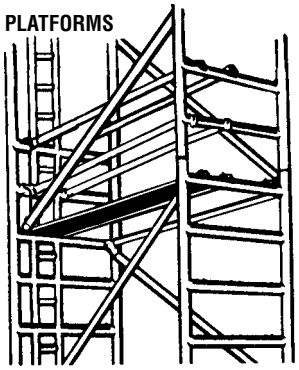
Beware of open ended building which can cause a funnelling effect.

ALL TOWERS



Fit the final platform ensuring that the trapdoor is above the ladder and the main (plain) platform is next to it. Fit toeboard unit around the platforms and push the two pins that are located at each end down. Remember to always close trapdoor immediately after climbing through.

REST PLATFORMS



Rest platforms must be fitted every 2m and consist of a trap platform and guardrails at 1m above and 0.5m as shown. Remember to always close trapdoor immediately after climbing through.

WARNING (BOTH)

WARNING: never work from or build, or dismantle the tower from an unguarded platform.

SPAN TOWER WITH CLIP IN VERTICAL LADDERS ERECTION MANUAL

Span towers with clip in vertical ladders are built in exactly the same way as ladder span towers with 5 rung starter frames (page 2).

Where a ladder frame is shown on page 2, use a plain frame and then clip a 2m vertical ladder onto the horizontals of the frame on the inside of the tower, ensuring that the spring loaded pins on the ladder locate under the rung.

Note. You cannot use 3 rung frames with clip in vertical ladders. Note also Illustration 14 on page 3.

COMPONENT SCHEDULE

DOUBLE WIDTH SPAN TOWERS WITH CLIP-IN VERTICAL LADDERS TO EN 1004-3-8/12 5 RUNG STARTER

Using the 3T (Through the Trap) Assembly method

		INTERNAL & EXTERNAL USE						INTERNAL USE ONLY				
PLATFORM HEIGHT	METRIC	2.4	3.4	4.4	5.4	6.4	7.4	8.4	9.4	10.4	11.4	12.4
DESCRIPTION	IMPERIAL	7'10"	11'2"	14'5"	17'9"	21'0"	24'3"	27'7"	30'10"	34'1"	37'5"	40'8"
1.8 m x 1.4 m SPAN	**CODE**											
150mm Adjustable Castors	2230	4	4	4	4	4	4	4	4	4	4	4
1.8m x 1.2mToeboard	2066	1	1	1	1	1	1	1	1	1	1	1
Double Base Frame	2001	2	2	2	2	2	2	2	2	2	2	2
Double Main Frame	2002	-	2	2	4	4	6	6	8	8	10	10
Double G.R. Frame	2003	2	-	2	-	2	-	2	-	2	-	2
1.8m Brace	2040	6	11	11	14	14	19	19	22	22	27	27
2.69m Brace	2041	3	4	5	6	7	8	9	10	11	12	13
1.8m Main Platform	2043	1	1	1	1	1	1	1	1	1	1	1
1.8m Trap Platform	2050	1	2	2	3	3	4	4	5	5	6	6
Small Stabiliser	2056	4	4	4	4	4	4	4	-	-	-	-
Large Stabiliser	2057	-	-	-	-	-	-	-	4	4	4	4
Vertical Ladder	2060	1	2	2	3	3	4	4	5	5	6	6
TOTAL SELF WEIGHT OF TOWER (KGS)		157	209	223	247	261	290	304	358	371	401	415
MAX. No. OF WORKING LEVELS		1	1	2	2	3	3	4	4	4	4	4

		INTERNAL & EXTERNAL USE						INTERNAL USE ONLY				
PLATFORM HEIGHT	METRIC	2.4	3.4	4.4	5.4	6.4	7.4	8.4	9.4	10.4	11.4	12.4
DESCRIPTION	IMPERIAL	7'10"	11'2"	14'5"	17'9"	21'0"	24'3"	27'7"	30'10"	34'1"	37'5"	40'8"
2.69 m x 1.4 m SPAN	**CODE**											
180mm Adjustable Castors	2230	4	4	4	4	4	4	4	4	4	4	4
2.6m x 1.2mToeboard	2068	1	1	1	1	1	1	1	1	1	1	1
Double Base Frame	2001	2	2	2	2	2	2	2	2	2	2	2
Double Main Frame	2002	-	2	2	4	4	6	6	8	8	10	10
Double G.R. Frame	2003	2	-	2	-	2	-	2	-	2	-	2
2.69m Brace	2041	6	11	11	14	14	19	19	22	22	27	27
3.35m Brace	2042	3	4	5	6	7	8	9	10	11	12	13
2.69m Main Platform	2044	1	1	1	1	1	1	1	1	1	1	1
2.69m Trap Platform	2051	1	2	2	3	3	4	4	5	5	6	6
Small Stabiliser	2056	4	4	4	4	4	4	4	-	-	-	-
Large Stabiliser	2057	-	-	-	-	-	-	-	4	4	4	4
Vertical Ladder	2060	1	2	2	3	3	4	4	5	5	6	6
TOTAL SELF WEIGHT OF TOWER (KGS)		179	211	226	281	296	328	343	405	420	453	467
MAX. No. OF WORKING LEVELS		1	1	2	2	3	3	3	3	3	3	3

Notes. The above schedule includes for:-

1. i) 1 working level with double toeboards and handrails at 1m and 0.5m.

2. To convert a rest platform to a working level add:

i) on a 1.8m long tower 1x1.8m Main Platform (2043) 1x1.8m Double Toeboard (2066)

ii) on a 2.7m long tower add 1x2.7m Main Platform (2044) 1x2.7m Double Toeboard (2068)

3. A working level on a Double Width Tower is 2 platforms side by side with toeboards and Guard Rails at 1m and 0.5m.

SAFETY NOTES

1. Before erecting check ground is level unobstructed and is suitable for the purpose. Also ensure area is clear of overhead obstructions, particularly power cables.
2. Check that brakes are applied and the tower is stable before use.
3. Do not ride on the tower or attempt to move a loaded tower.
4. Always climb the tower from the inside.
5. Do not overload the tower. Maximum platformloads 200 kg/m^2 (2kN/m^2). Maximum tower load 2500kg mobile. Maximum horizontal force at platform 30kg.
6. When moving a tower, reduce the height to a maximun of 4m. Check that there are no power lines or other obstructions overhead.
7. Mobile towers must be moved by pushing at the base only. Beware of soft or uneven ground, drains or pot-holes and overhead obstructions, especially power cables. Stabilisers may be raised to a maximum of 25mm above the ground. Immediately after moving, apply the brakes and check that the tower is upright and stable and stabilisers returned to ground level.
8. Never remove components from a tower whilst it is erected. Dismantling must always be performed from the top. Failure to observe this rule will seriously reduce the strength and safety of the tower.
9. Do not use damaged components. Check all components before use and periodically lubricate all moving parts and wipe off surplus oil.
10. Beware of high winds. Secure the tower when in exposed positions and when left unattended.
11. Do not lean ladders against towers or use ladders on top of platforms.
12. At heights where components cannot be passed up or down by hand, a rope should be used for securing to components to aid safe raising and lowering.
13. Never work from, or build or dismantle the tower from an unguarded platform.
14. Legislation now calls for inspection and recording of assembled towers. See HSE guidance note 10 (revision 4) for further details.