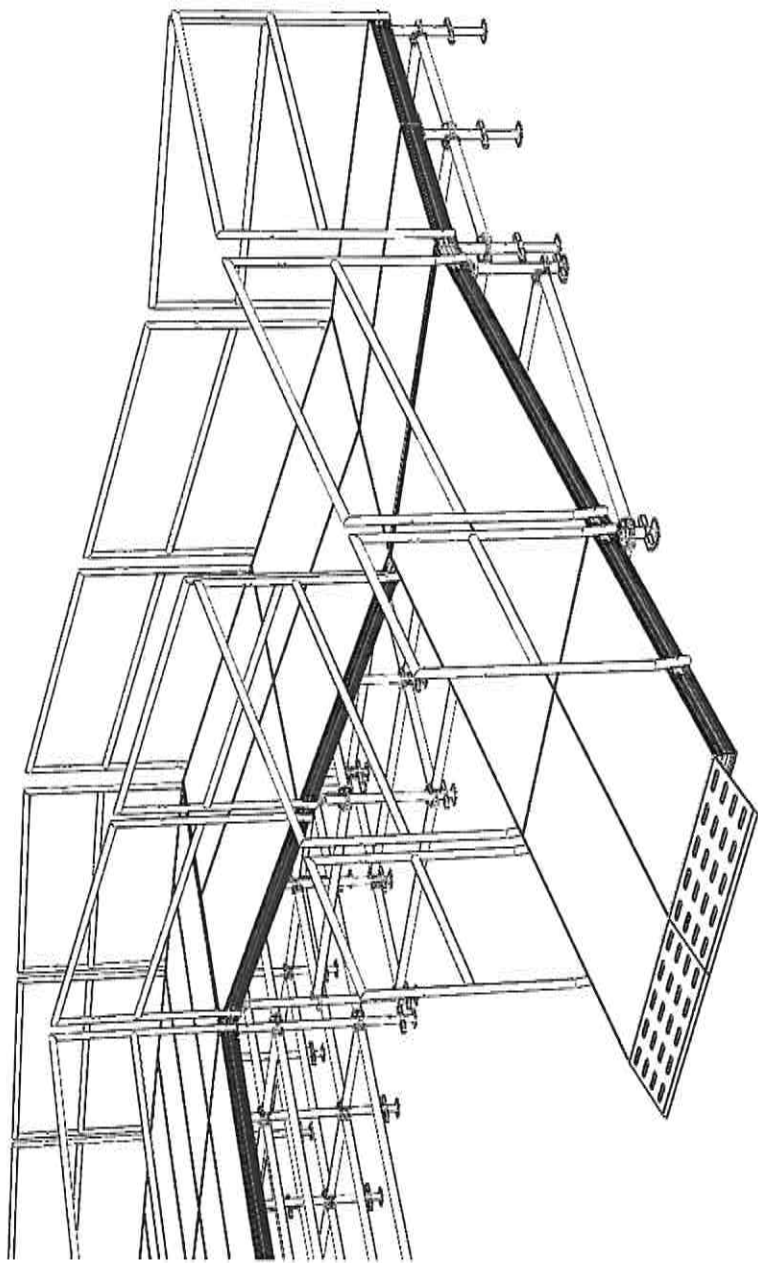

User Manual for
Stage Plus Stage Ramp



NOTES

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1. PREFACE

Stage Plus, a Stage Audio Works brand, is devoted to the design, development and manufacture of problem-solving products including Stage Decks, Trussing, Roof Structures, Flight Cases, Padded Bag, Snake Boxes and Pre-made Cable.

Products built for industry people by industry people using advanced software, machinery and materials finding a balance between quality, automation and efficiency. Assembly is undertaken by a carefully selected group who have the product quality at heart.

Stage Plus products offers durability and use only the highest quality hardware available on the market. The new advanced CAD drawing capabilities allow products to be modelled in 3D before they are built. Virtual products avoid constant corrections to the real product.

All aluminium is a structural grade (6082-T6) and wood toppings are specially sourced European Birch plywood.

This manual was produced for all users of Stage Plus Products and should be readily available for anyone assembling, disassembling or loading a Stage Plus Product.

This User Manual can be found, viewed or downloaded at www.stageplus.co.za/ www.stageaudioworks.com

A full and thorough understanding of this manual and its specific information is crucial to the assembly and maintenance of this Stage Plus Product.

NOTE !

- When assembling this product, wear appropriate personal protective equipment, ie. rigging gloves, steel toe boots, helmets and other required PPE.
- It is a criminal offence to erect and use scaffolding and stage decking systems which do not comply with the minimum safety standards of the OSHACT. The Code of Practice: "SANS 10085-1:2004, The design, erection, use and inspection of access scaffolding", (previously called SABS 085-2000) greatly emphasizes the use of trained personnel to erect / maintain scaffolding. This is possibly the most essential factor in preventing accidents.
- Other relevant codes which the customer should comply to: SABS 1169-1978 : specification for TEMPORARY STANDS
SANS 10295 : PART 1 - permanent suspended access equipment
PART 2 - temporary suspended access equipment
SANS 10400
Access for the disabled shall be provided in accordance with Part S of SANS 10400.

Stage Plus - Stage Ramp

The Stage Ramp consists out of existing standard parts of the Stage Plus range like standard StageDecks and the SP-360 scaffolding components.

The Stage Ramp is a modular system that can be expanded to fit heights up to 2400mm standard in increments of 300mm. The system is designed so that a horizontal length of 1m will incline to 300mm high vertically to be suitable for rolling equipment on and off stage, wheel chair acces and walk ways.

The Stage Ramp will withstand verticle forces of up to 750 kg/m like the standard Stage Plus Stage Decks.

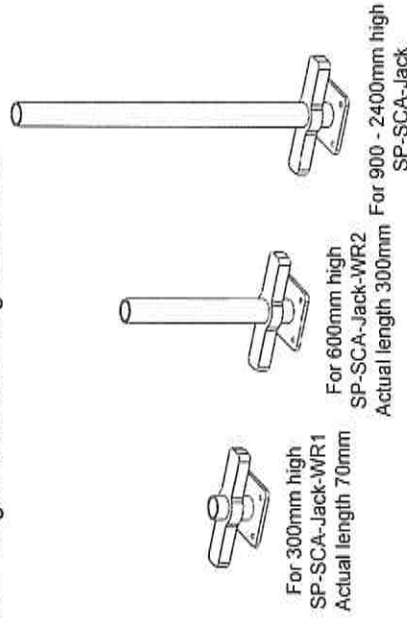
The standard angle of the ramp is 8,5 degrees and heights can be adjusted to suit unlevel surfaces.

A few sollutions are available like landings and 90 degree direction changes to decrease the ramp lenght in certain cases where space is limited.

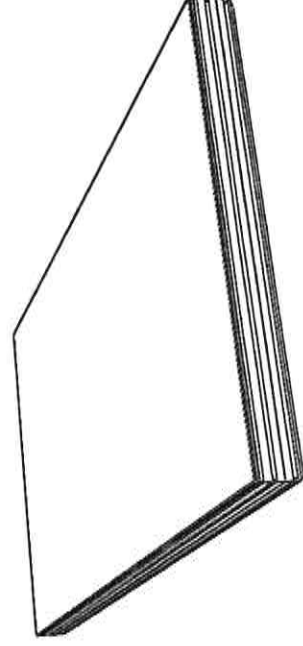
2. COMPONENTS

The components below are needed to assemble a Stage Ramp.
See Parts Quantity Table for the quantity of parts needed to assemble the specific size stage.

2.1 Stage Plus Scaffolding Base Jacks



2.5 Stage Plus Stage Deck (Pro Deck with Black Phenolic Mesh Coating)

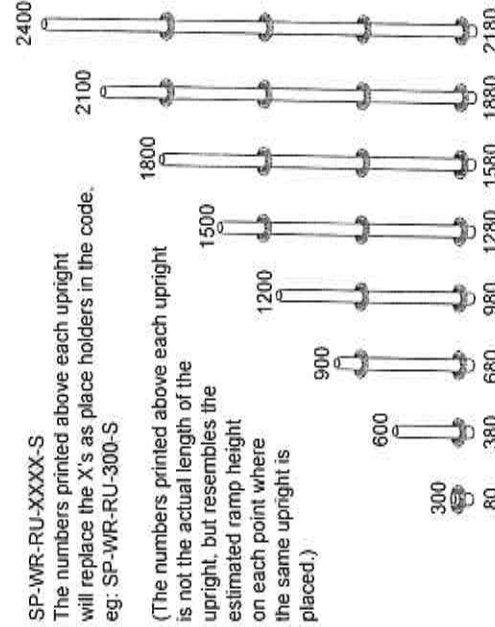


SP-DEC-2.0x1.0-PRO (2m x 1m Standard Pro Deck)
SP-DEC-1.0x1.0-PRO (1m x 1m Standard Pro Deck for 1m x 1m Landings)
SP-DEC-1.355x1.0-PRO (1.355m x 1m Ramp starter Deck)

2.2 Stage Plus Round Uprights Modified for Stage Plus Stage Ramp

SP-WR-RU-XXXX-S

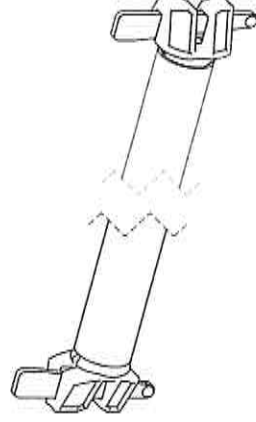
The numbers printed above each upright
will replace the X's as place holders in the code.
eg: SP-WR-RU-300-S



(The numbers printed above each upright
is not the actual length of the
upright, but resembles the
estimated ramp height
on each point where
the same upright is
placed.)

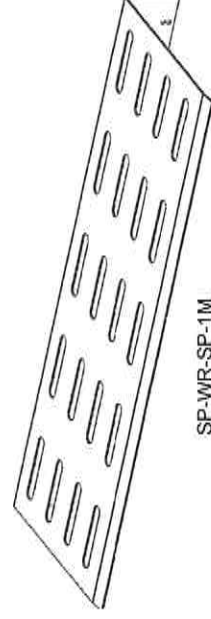
(The numbers printed underneath the upright resembles the actual size
in millimeters of each upright.)

2.6 Stage Plus Round Ledgers

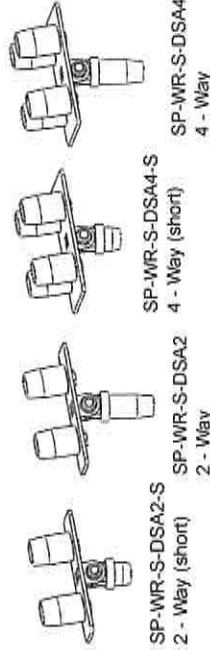


SP-360-RL-0850-G (Round Ledger 850mm - Actual size: 842mm)
SP-360-RL-0900-G (Round Ledger 900mm - Actual size: 897mm)
SP-WR-RL-1820-G (Round Ledger 1820mm - Actual size: 1822mm)
SP-WR-RL-1930-G (Round Ledger 1930mm - Actual size: 1931mm)

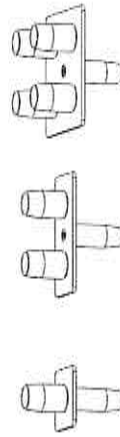
2.7 Stage Plus Stage Ramp Step-on Plate



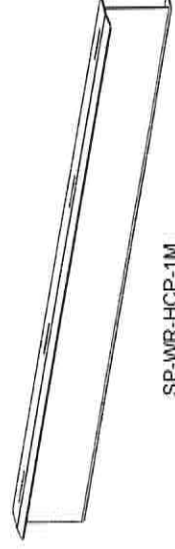
2.3 Swivel Deck Scaff Adaptors (Swivel DSA's)



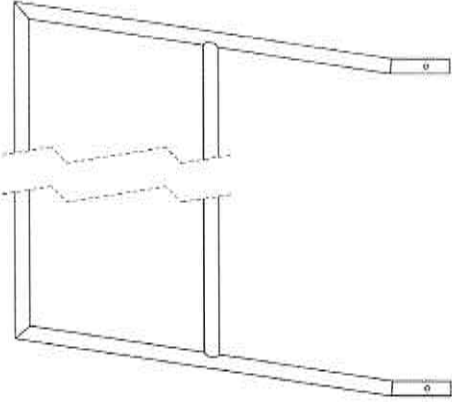
2.4 Deck Scaff Adaptors (DSA's)



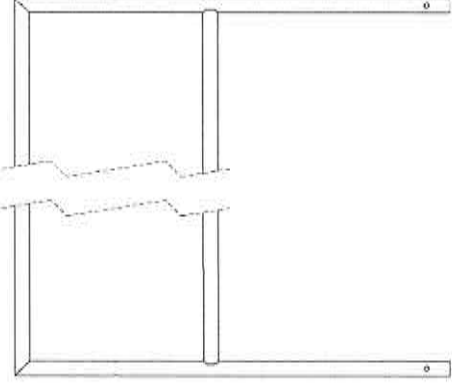
2.8 Stage Plus Stage Ramp Hook-on Cover Plate



2.9 Stage Plus Aluminium Handrails with Deckside Connecting Brackets

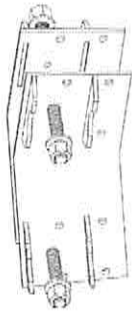


SP-DEC-AHR1-AL-CB (Angular Aluminium Handrail - 1m)
SP-DEC-AHR2-AL-CB (Angular Aluminium Handrail - 2m)

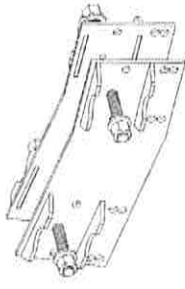


SP-DEC-HR1-AL-CB (Aluminium Handrail - 1m)
SP-DEC-HR2-AL-CB (Aluminium Handrail - 2m)

2.10 Stage Deck Connecting Plate with Handrail Addaptor 180 degree

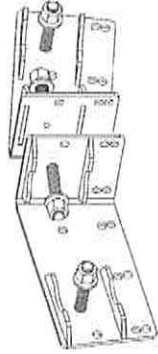


SP-WR-CP-S-I-L-L (From angular to horizontal decks - Left)
SP-WR-CP-S-I-L-R (From angular to horizontal decks - Right)

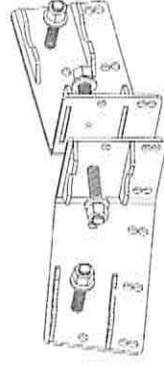


SP-WR-CP-S-L-I-L (From horizontal to angular decks - Left)
SP-WR-CP-S-L-I-R (From horizontal to angular decks - Right)

2.11 Stage Deck Connecting Plate with Handrail Addaptor 90 degree

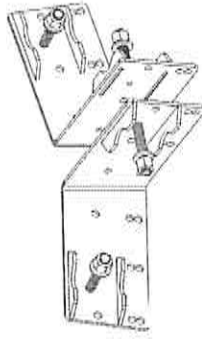


SP-WR-CP-A-I-L-L (From angular to horizontal decks - Left)
SP-WR-CP-A-I-L-R (From angular to horizontal decks - Right)



SP-WR-CP-A-L-I-L (From horizontal to angular decks - Left)
SP-WR-CP-A-L-I-R (From horizontal to angular decks - Right)

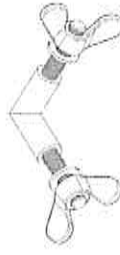
2.13 Handrail Securing Rod Assemblies



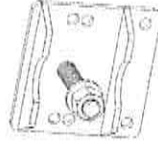
SP-WR-CP-A-I-L-L (From angular to angular decks - Left)
SP-WR-CP-A-I-L-R (From angular to angular decks - Right)



SP-DEC-HR-SRA (Handrail Securing Rod Assembly)



2.12 Standard Handrail Connecting Bracket



SP-DEC-HR-CB

2.14 Square Bolt and Dome Nut



M-BOL-SQ-15x15x8

3. PARTS QUANTITY TABLES FOR DIFFERENT RAMPS

3.1

Stage Ramp - Parts Quantity Table for 1m or Single Deck Ramps													
Part	Sap No:	300	500	600	1200	1800	2100	2400	QTY	QTY	QTY	QTY	QTY
Starter Pro Deck 1.355 x 1m	SP-DEC-1.355x1.0-PRO	1	1	1	1	1	1	1	1	1	1	1	1
Standard Pro Deck 2m x 1m	SP-DEC-2.0x1.0-PRO	0	1	2	3	4	5	6	7				
Scaffold Jacks for 300mm Ramp Height	SP-SCA-Jack-WR1	2	2	2	2	2	2	2	2	2	2	2	2
Scaffold Jacks for 600mm Ramp Height	SP-SCA-Jack-WR2	0	2	2	2	2	2	2	2	2	2	2	2
Standard Scaffolds Jack	SP-SCA-Jack	0	0	2	4	6	8	10	12				
Upright for 300mm Ramp Height	SP-WR-RU-300-G	2	2	2	2	2	2	2	2	2	2	2	2
Upright for 600mm Ramp Height	SP-WR-RU-600-G	0	2	2	2	2	2	2	2	2	2	2	2
Upright for 900mm Ramp Height	SP-WR-RU-900-G	0	0	2	2	2	2	2	2	2	2	2	2
Upright for 1200mm Ramp Height	SP-WR-RU-1200-G	0	0	0	2	2	2	2	2	2	2	2	2
Upright for 1500mm Ramp Height	SP-WR-RU-1500-G	0	0	0	0	2	2	2	2	2	2	2	2
Upright for 1800mm Ramp Height	SP-WR-RU-1800-G	0	0	0	0	0	2	2	2	2	2	2	2
Upright for 2100mm Ramp Height	SP-WR-RU-2100-G	0	0	0	0	0	0	2	2	2	2	2	2
Upright for 2400mm Ramp Height	SP-WR-RU-2400-G	0	0	0	0	0	0	0	0	0	0	0	0
Swivel DSA - 2 Way - Short	SP-WR-S-DSA2-S	2	2	2	2	2	2	2	2	2	2	2	2
Swivel DSA - 2 Way	SP-WR-S-DSA2	0	2	4	6	8	10	12	14				
850 Round Ledger	SP-360-RL-0850-G	1	2	4	6	8	10	12	14				
1820 Round Ledger	SP-WR-RL-1820-G	0	2	2	4	4	4	4	4	4	4	4	4
1930 Round Ledger	SP-WR-RL-1930-G	0	0	2	4	8	12	16	20				
Hook-on Cover Plate	SP-WR-HCP-1M	1	1	1	1	1	1	1	1	1	1	1	1
Step-on Plate	SP-WR-SP-1M	1	1	1	1	1	1	1	1	1	1	1	1
Ramp Conn. Plate-90° Incline to Landing-Left	SP-WR-CP-A-I-L	1	1	1	1	1	1	1	1	1	1	1	1
Ramp Conn. Plate-90° Incline to Landing-Right	SP-WR-CP-A-I-R	1	1	1	1	1	1	1	1	1	1	1	1
Handrail Connecting Brackets	SP-DEC-HR-CB	2	6	10	14	18	22	26	30				
Angular Handrails - 1m	SP-DEC-AHR1-AL-CB	2	2	2	2	2	2	2	2	2	2	2	2
Angular Handrails - 2m	SP-DEC-AHR2-AL-CB	0	0	2	4	6	8	10	12				
Angular Handrails - 2m - Special	SP-DEC-AHR2-AL-CB-S	0	2	2	2	2	2	2	2	2	2	2	2
Angular Handrails - 2m - Special 1	SP-DEC-AHR2-AL-CB-S	0	0	0	0	0	0	0	0	0	0	0	0
Handrail Securing Rod	SP-DEC-HR-SRA	0	2	4	6	8	10	12	14				
Handrail Securing Rod 90°	SP-DEC-HR-SRA-C	2	2	2	2	2	2	2	2	2	2	2	2
Square Bolts and Dome Nuts	M-BOL-SQ-15x15x8	56	72	88	104	120	136	152	168				
Ramp Conn. Plate-180° Incline to Landing-Left	SP-WR-S-I-L-L	1	1	1	1	1	1	1	1	1	1	1	1
Ramp Conn. Plate-180° Incline to Landing-Right	SP-WR-S-I-L-R	1	1	1	1	1	1	1	1	1	1	1	1

3.2

Stage Ramp - Parts Quantity Table for 1m or Single Deck Ramps with a Landing

Part	Sap No:	QTY	QTY	QTY	QTY	QTY	QTY	QTY	QTY
Starter Pro Deck 1.355 x 1m	SP-DEC-1.355x1.0-PRO	N/A	1	1	1	1	1	1	1
Standard Pro Deck 2m x 1m	SP-DEC-2.0x1.0-PRO	N/A	1	2	3	4	5	6	7
Scaffold Jacks for 300mm Ramp Height	SP-SCA-Jack-WR1	N/A	8	2	2	2	2	2	2
Scaffold Jacks for 600mm Ramp Height	SP-SCA-Jack-WR2	N/A	2	8	8	2	2	2	2
Standard Scaffolds Jack	SP-SCA-Jack	N/A	0	2	4	12	14	16	18
Upright for 300mm Ramp Height	SP-WR-RU-300-G	N/A	8	2	2	2	2	2	2
Upright for 600mm Ramp Height	SP-WR-RU-600-G	N/A	2	8	8	2	2	2	2
Upright for 900mm Ramp Height	SP-WR-RU-900-G	N/A	0	2	2	2	2	2	2
Upright for 1200mm Ramp Height	SP-WR-RU-1200-G	N/A	0	0	2	2	2	2	2
Upright for 1500mm Ramp Height	SP-WR-RU-1500-G	N/A	0	0	0	2	2	2	2
Upright for 1800mm Ramp Height	SP-WR-RU-1800-G	N/A	0	0	0	0	2	2	2
Upright for 2100mm Ramp Height	SP-WR-RU-2100-G	N/A	0	0	0	0	0	2	2
Upright for 2400mm Ramp Height	SP-WR-RU-2400-G	N/A	0	0	0	0	0	0	2
Swivel DSA - 2 Way - Short	SP-WR-S-DSA2-S	N/A	4	2	2	2	2	2	2
Swivel DSA - 2 Way	SP-WR-S-DSA2	N/A	2	6	8	10	12	14	16
850 Round Ledger	SP-360-RL-0850-G	N/A	7	8	11	14	16	22	24
1820 Round Ledger	SP-WR-RL-1820-G	N/A	0	2	8	10	10	10	10
1930 Round Ledger	SP-WR-RL-1930-G	N/A	0	0	0	2	6	10	14
Hook-on Cover Plate	SP-WR-HCP-1M	N/A	2	2	2	2	2	2	2
Step-on Plate	SP-WR-SP-1M	N/A	1	1	1	1	1	1	1
Ramp Conn. Plate-90°-Incline to Landing-Left	SP-WR-CP-A-I-L	N/A	1	1	1	1	1	1	1
Ramp Conn. Plate-90°-Incline to Landing-Right	SP-WR-CP-A-I-R	N/A	1	1	1	1	1	1	1
Handrail Connecting Brackets	SP-DEC-HR-CB	N/A	2	6	10	14	18	22	26
Angular Handrails - 1m	SP-DEC-AHR1-AL-CB	N/A	2	2	2	2	2	2	2
Angular Handrails - 2m	SP-DEC-AHR2-AL-CB	N/A	0	0	0	2	4	6	8
Angular Handrails - 2m - Special	SP-DEC-AHR2-AL-CB-S	N/A	0	2	6	6	6	6	6
Angular Handrails - 2m - Special 1	SP-DEC-AHR2-AL-CB-S	N/A	2	2	0	0	0	0	0
Handrail Securing Rod	SP-DEC-HR-SRA	N/A	0	6	8	10	12	14	16
Handrail Securing Rod 90°	SP-DEC-HR-SRA-C	N/A	4	4	4	4	4	4	4
Square Bolts and Dome Nuts	M-BOL-SQ-15x15x8	N/A	106	122	138	154	170	186	202
Standard Pro Deck 1m x 1m	SP-DEC-1.0x1.0-PRO	N/A	1	1	1	1	1	1	1
500mm Uprights	SP-360-RU-0500-G	N/A	0	0	0	4	4	0	0
1000mm Uprights	SP-360-RU-1000-G	N/A	0	0	0	0	0	4	4
Ramp Conn. Plate-180°-Incline to Landing-Left	SP-WR-S-I-L-L	N/A	1	1	1	1	1	1	1
Ramp Conn. Plate-180°-Incline to Landing-Right	SP-WR-S-I-L-R	N/A	1	1	1	1	1	1	1
Ramp Conn. Plate-180°-Landing to Incline-Left	SP-WR-S-L-I-L	N/A	1	1	1	1	1	1	1
Ramp Conn. Plate-180°-Landing to Incline-Right	SP-WR-S-L-I-R	N/A	1	1	1	1	1	1	1
Ramp Conn. Plate-90°-Landing to Incline-Left	SP-WR-CP-A-L-I-L	N/A	1	1	1	1	1	1	1
Ramp Conn. Plate-90°-Landing to Incline-Right	SP-WR-CP-A-L-I-R	N/A	1	1	1	1	1	1	1
Ramp Conn. Plate-90°-Incline to Incline-Left	SP-WR-CP-A-I-L-L	N/A	1	1	1	1	1	1	1
Ramp Conn. Plate-90°-Incline to Incline-Right	SP-WR-CP-A-I-L-R	N/A	1	1	1	1	1	1	1
DSA - 1Way	SP-DEC-DSA1	N/A	0	4	4	4	4	4	4
DSA - 1 Way - Short	SP-DEC-DSA1-S	N/A	4	0	0	0	0	0	0
1710 Round Ledger	SP-WR-RL-1710-G	N/A	2	2	0	0	0	0	0
Handrails - 1m	SP-DEC-HR1-AL-CB	N/A	2	2	2	2	2	2	2

3.3

Stage Ramp - Parts Quantity Table for 2m or Double Deck Ramps

Part ▼	Sap No:	QTY	QTY	QTY	QTY	QTY	QTY	QTY	QTY
Starter Pro Deck 1.355 x 1m	SP-DEC-1.355x1.0-PRO	2	2	2	2	2	2	2	2
Standard Pro Deck 2m x 1m	SP-DEC-2.0x1.0-PRO	0	2	4	6	8	10	12	14
Scaffold Jacks for 300mm Ramp Height	SP-SCA-Jack-WR1	3	3	3	3	3	3	3	3
Scaffold Jacks for 600mm Ramp Height	SP-SCA-Jack-WR2	0	3	3	3	3	3	3	3
Standard Scaffolds Jack	SP-SCA-Jack	0	0	3	6	9	12	15	18
Upright for 300mm Ramp Height	SP-WR-RU-300-G	3	3	3	3	3	3	3	3
Upright for 600mm Ramp Height	SP-WR-RU-600-G	0	3	3	3	3	3	3	3
Upright for 900mm Ramp Height	SP-WR-RU-900-G	0	0	3	3	3	3	3	3
Upright for 1200mm Ramp Height	SP-WR-RU-1200-G	0	0	0	3	3	3	3	3
Upright for 1500mm Ramp Height	SP-WR-RU-1500-G	0	0	0	0	3	3	3	3
Upright for 1800mm Ramp Height	SP-WR-RU-1800-G	0	0	0	0	0	3	3	3
Upright for 2100mm Ramp Height	SP-WR-RU-2100-G	0	0	0	0	0	0	3	3
Upright for 2400mm Ramp Height	SP-WR-RU-2400-G	0	0	0	0	0	0	0	3
Swivel DSA - 2 Way - Short	SP-WR-S-DSA2-S	2	2	2	2	2	2	2	2
Swivel DSA - 2 Way	SP-WR-S-DSA2	0	2	4	6	8	10	12	14
Swivel DSA - 4 Way - Short	SP-WR-S-DSA2-S	1	1	1	1	1	1	1	1
Swivel DSA - 4 Way	SP-WR-S-DSA2	0	1	2	3	4	5	6	7
900 Round Ledger	SP-360-RL-0850-G	2	4	6	12	16	20	24	28
1820 Round Ledger	SP-WR-RL-1820-G	0	3	3	6	6	6	6	6
1930 Round Ledger	SP-WR-RL-1930-G	0	0	3	6	12	18	24	30
Hook-on Cover Plate	SP-WR-HCP-1M	2	2	2	2	2	2	2	2
Step-on Plate	SP-WR-SP-1M	2	2	2	2	2	2	2	2
Ramp Conn. Plate-90°-Incline to Landing-Left	SP-WR-CP-A-I-L	1	1	1	1	1	1	1	1
Ramp Conn. Plate-90°-Incline to Landing-Right	SP-WR-CP-A-I-R	1	1	1	1	1	1	1	1
Handrail Connecting Brackets	SP-DEC-HR-CB	2	6	10	14	18	22	26	30
Angular Handrails - 1m	SP-DEC-AHR1-AL-CB	2	2	2	2	2	2	2	2
Angular Handrails - 2m	SP-DEC-AHR2-AL-CB	0	0	2	4	6	8	10	12
Angular Handrails - 2m - Special	SP-DEC-AHR2-AL-CB-S	0	2	2	2	2	2	2	2
Angular Handrails - 2m - Special 1	SP-DEC-AHR2-AL-CB-S	0	0	0	0	0	0	0	0
Handrail Securing Rod	SP-DEC-HR-SRA	0	2	4	6	8	10	12	14
Handrail Securing Rod 90°	SP-DEC-HR-SRA-C	2	2	2	2	2	2	2	2
Square Bolts and Dome Nuts	M-BOL-SQ-15x15x8	56	72	96	88	104	120	152	168
Ramp Conn. Plate-180°-Incline to Landing-Left	SP-WR-S-I-L-L	1	1	1	1	1	1	1	1
Ramp Conn. Plate-180°-Incline to Landing-Right	SP-WR-S-I-L-R	1	1	1	1	1	1	1	1

3.4

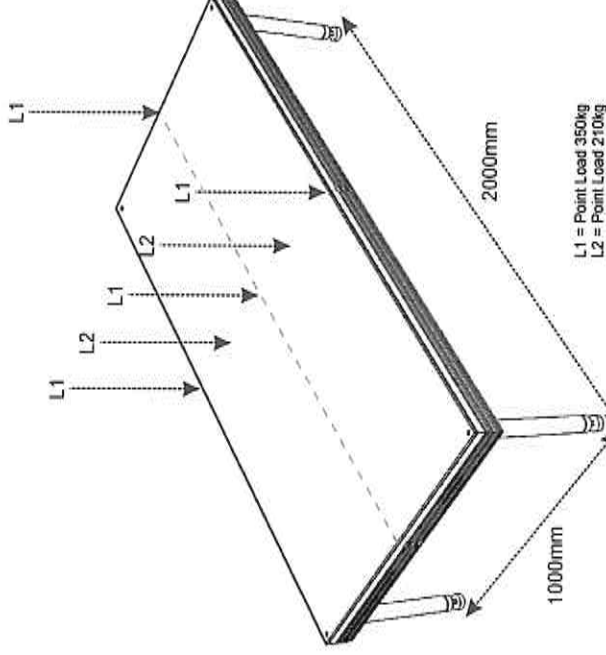
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4. TECHNICAL SPESIFICATIONS

Loading Types	
Uniformly distributed load	750kg/m ²
Load Point L1	350kg
Load Point L2	210kg

L = Load Point.

Technical Specifications for Stage Deck	
Frame	Structural Grade Aluminium (6082-T6)
Wood Topping	European Birch Plywood
Treatment	Phenolic / Painted
Legs	Structural Grade Aluminium (6082-T6)
Legs with adjustable feet	Structural Grade Aluminium (6082-T6) with adjustable feet
Max. Load	750 kg/m ² UDL
Deck Weight	Phenolic - 42 kg



Stage Plus Stage Decks comply with the 500kg/m² guideline of SANS 1169 Edition 2 Temporary stands.

Certification, Testing and Inspection:

It is the responsibility of the User to ensure that the truss sections are inspected and tested at the appropriate frequency.

It is the User's responsibility to ensure that the stage deck structure is signed off by a structural engineer each time the temporary structure is erected.

All components must be visually checked by the user for damage before and during assembly. Any damage to the members or accessories or cracking should be assessed by a Chartered Structural Engineer, or other competent person, who has adequate experience in the use of structures of this type.

On no account must the structure be used if any significant damage to the members or cracks are found. If in doubt, the User shall contact Stage Plus and seek advice before proceeding.

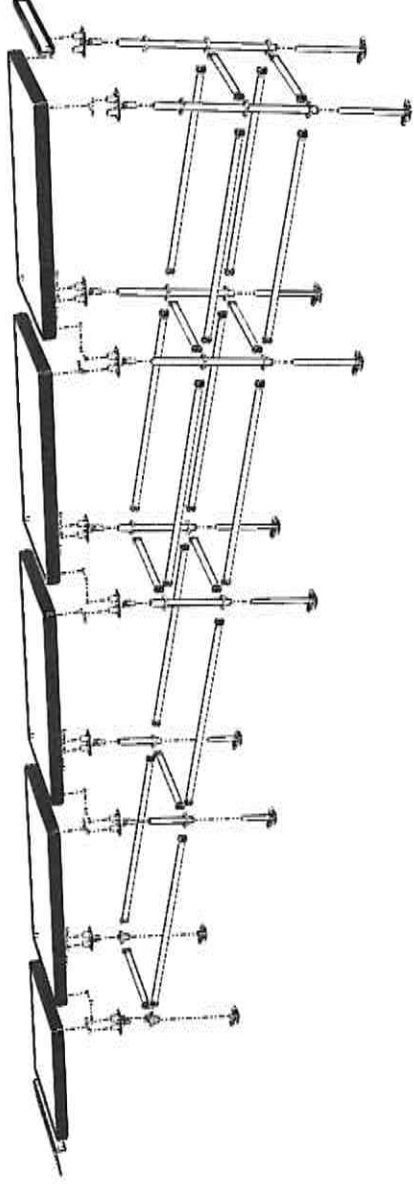
Ground Bearing Capacity:

The stage deck system shall be founded on suitable bearing strata. The bearing pressure on the ground can be derived from the axial load of the stage deck system in service and the area of the leg system. The allowable bearing pressures should be established on site and agreed with the Local and Statutory Authorities.

Adequate spreader plates (levelling blocks) shall be used under the legs/jacks as appropriate.

If outdoor, care should be taken when positioning rainwater pipes. They should be located away from the leg bases as changes in moisture content in the ground will change the allowable bearing capacity.

5. ASSEMBLY INSTRUCTIONS



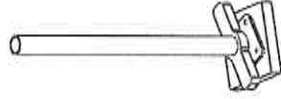
5.1 Cordon off the area to prevent unauthorised access, particularly on busy sites.

5.2 Assess ground bearing capacity, do not continue if ground surface is not suitable.

5.3 Plan the area where the ramp needs to be installed well. While assembling the installed parts will get heavy and will be difficult to move into place at a later stage. It does not matter if the main stage or the Stage Ramp is built first, but it is recommended to assemble the Stage Ramp first in the right location and then the Main Stage and all the other parts needed.

5.4 Every stage deck length (2m) placed at an angle resembles 300mm of height. For example, if the decks need to lift 300mm high, only one deck will be required, for 600mm high two decks, 900mm high three decks etc.

5.5 It is always good practice to place wooden blocks under scaffold jacks firstly to widen the jack plate area and secondly so that the jack plate does not damage the surface under the jack plate.



5.6 Start by laying out the scaffold jacks on blocks.

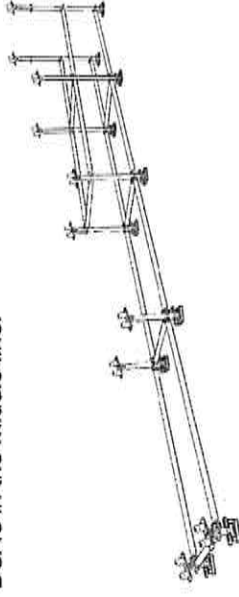
Note that the SP-SCA-Jack-WR1 jacks must be laid out in the first line to create the first 300mm of ramp height. SP-SCA-Jack-WR2 jacks will create the line under the area where the ramp will be 600mm high. From 900mm high use SP-SCA-Jack jacks for all the other heights.



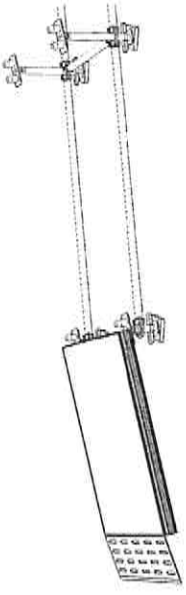
5.7 Place the uprights referred to in the component list as follows: Start by placing the SP-WR-RU-300S for 300mm high in the first line. Place the other uprights in increments of 300mm after that.

5.8 Start installing the ledgers between the uprights. Place SP-WR-RL-1820-G ledger in the first bay to and from Landings. Note that the first bay from 0 to 300mm high doesn't require any ledgers. The last bay before connecting to the Main Stage will also use SP-WR-RL-1820-G ledgers. All the other bays in between will have SP-WR-RL-1930-G ledgers. If the ramp is assembled 1m wide or one deck wide, use SP-360-RL-0850-G ledgers between all the uprights of the same height. If the ramp is 2m wide or two decks wide, use SP-360-RL-0900-G ledgers between all the uprights of the same height. Where there are more than one connecting rosette on an upright, a second row of ledgers must be installed on the highest possible rosettes on the same height.

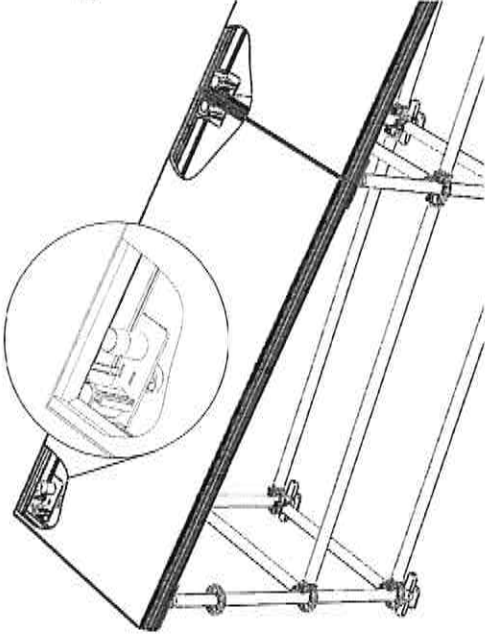
5.9 Place the angular DSA's into the top holes of the uprights. If the ramp is assembled in one line of decks or 1m wide, only use 2-way angular DSA's. When the ramp is assembled two decks or 2m wide, use 2-way DSA's on the outer lines and 4-way DSA's in the middle line.



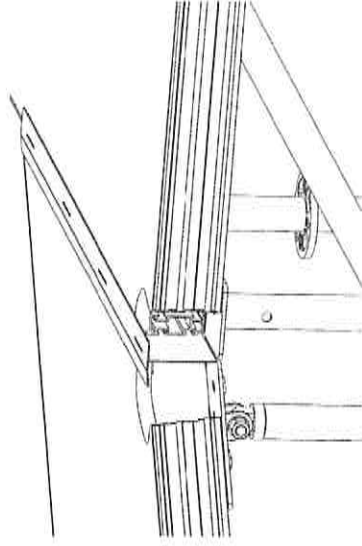
- 5.10 Connect the Step-on Plate to Stage Deck SP-DEC-1.355-1.0-PRO. Always use this deck as a starter deck on any ramp to rise to the first 300mm in height.



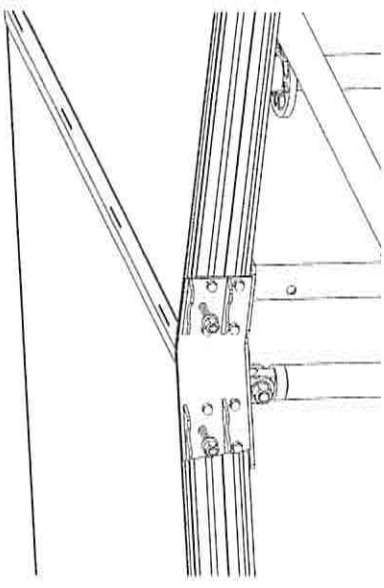
- 5.11 Place all the decks onto the Angular DSA's so that the top aluminium part of the DSA fits into the corner piece (provided for legs or scaffolding suspension) of the stage decks. The last DSA before connecting to the Main Stage or to and from Landings will be connected, as shown in the figure below, to create space between the upright of the Stage Ramp and the uprights of the Main Stage or Landings.



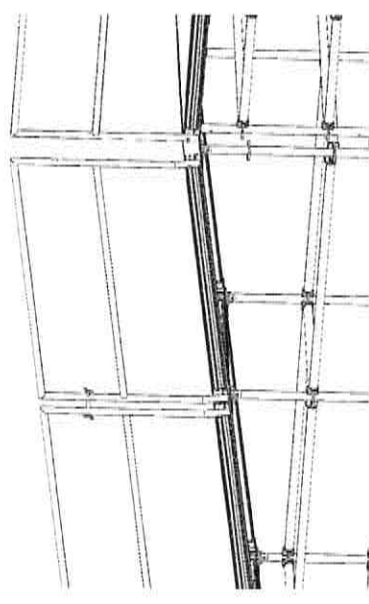
- 5.12 Install the Hook-on Plates as shown in the figure below. Note that Hook-on Plates only get installed between Decks from an angle towards horizontal Decks like in the case of a Landing or a Main Stage. No Hook-on Plate will be required between horizontal Decks and Decks that incline.



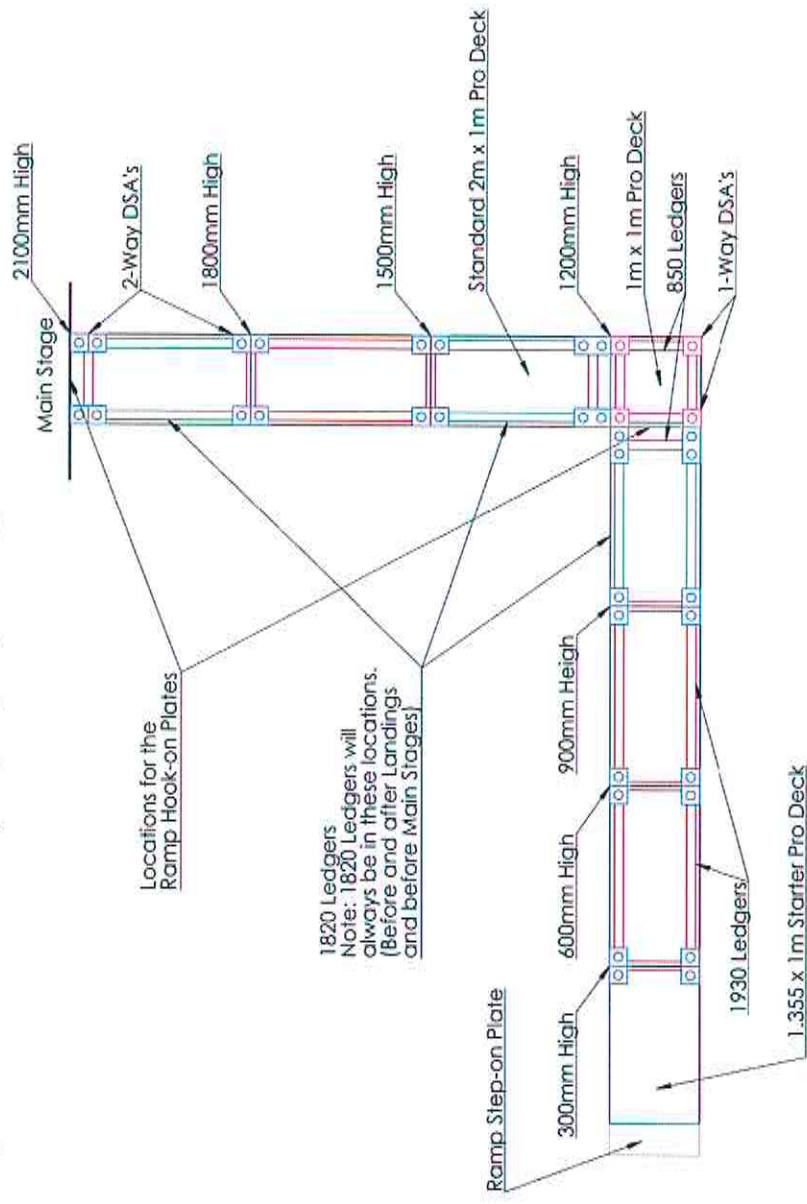
- 5.13 During Ramp assembly all Landings will be treated the same as Main Stages. The stage ramp is loose from the Landing until connected to the Landing with Stage Deck Connecting Plates. All the Deck Connecting plates can now be installed as shown in the figure below.



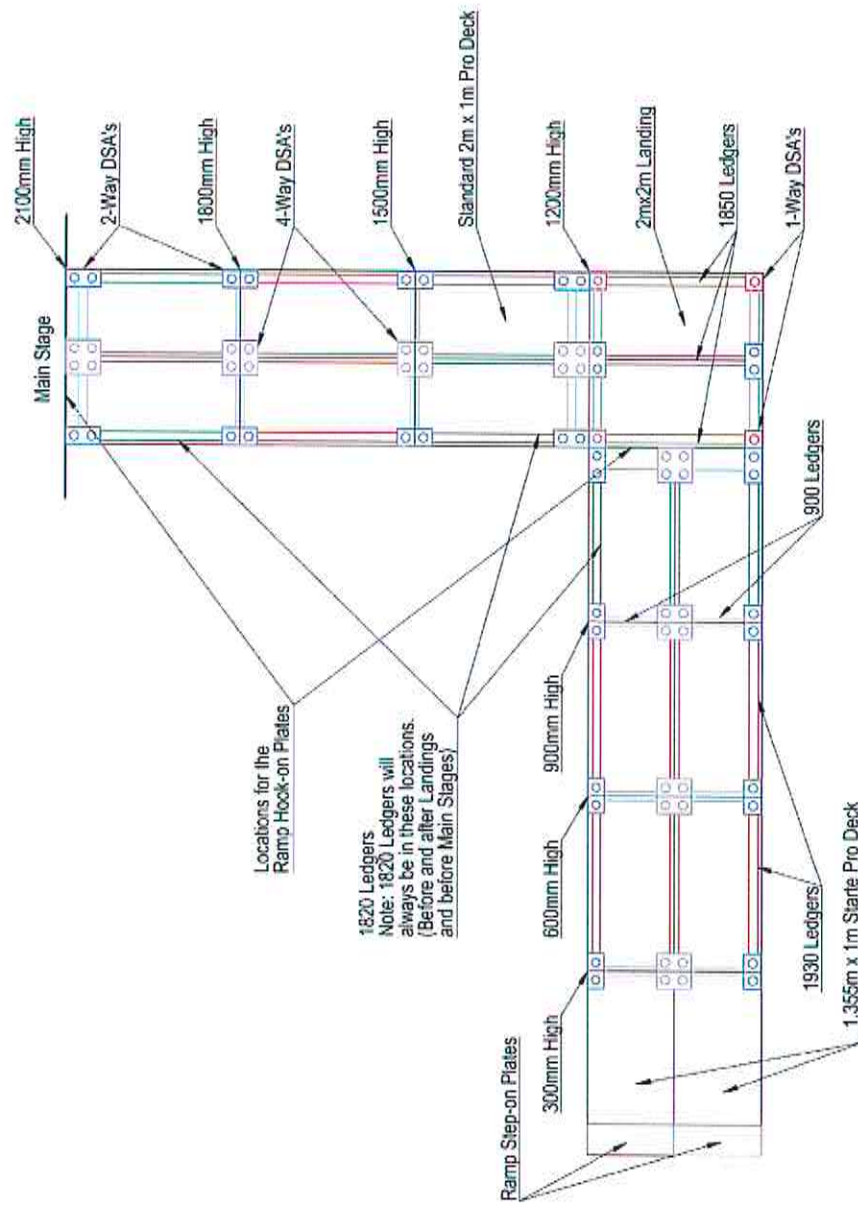
- 5.14 Fit the Handrails to Deck Connecting Plates and Handrail Connecting Plates as shown in the figure below. Fit Handrail Securing Rod Assemblies between all Handrails for stability between Handrails.



6. Ledger and Deck Scaff Adaptor (DSA) Layout Diagrams



6.1 Schematic Proposal of Stage Plus Stage Ramp 2.1m High and 1 Deck wide (1m Wide)



6.2 Schematic Proposal of Stage Plus Stage Ramp 2.1m High and 2 Decks wide (2m Wide)

7. TRANSPORT, STORAGE & MAINTANANCE

Components of Stage Deck should be transported securely at all time. Pallets or dollies are to be used when equipment is transported from one location to another. Incorrect care during transportation can result in equipment being damaged. Any damaged equipment will adversely affect the workings and structural integrity of the equipment.

Components are to be stored carefully to avoid dust and other environmental debris. This system is to be kept free of dirt and can be maintained and cleaned with warm soapy water. Avoid the use of abrasive cleaning utensils. For easy handling Store Stage Decks flat, wood to wood and aluminium to aluminium.

8. CODES & STANDARDS

- SANS 1169 for Temporary Stands.
 - Safety at Sports and Recreation Events Act, no. 2 of 2010
- The Disaster Management Act, no. 57 of 2002
- Occupational Health and Safety Act

9. HEALTH & SAFETY CONSIDERATIONS

For temporary seating stands the requirements of SANS 1169 and SANS 10400 must be fully comply with in all respects. Where there are discrepancies or ambiguities between the two documents the requirements of SANS 10400 take precedent. The recommendations contained in the report on Temporary Demountable Structures published by the Institution of Structural Engineer's, London, should also be complied with.

1. Fire extinguishers are to be provided at a rate of one (1) per every 100m² or part hereof.
2. Fire extinguishers to be placed in easily accessible and visible positions and shall be properly indicated with signage.

WARNING

Usage of unapproved accessories can lead to
personal injury, equipment damage, and
component failure.

This user manual can be found, viewed or downloaded at
www.stageplus.co.za / www.stageaudioworks.com

10. TROUBLE SHOOTING

PROBLEM	SOLUTION
1. Stage Decks don't align properly and some decks lie in more extreme angles than others.	1. Use a long straight edge and align decks by adjusting the height up or down on the scaffold Jacks.
2. The upright of handrails are not parallel and the securing rods don't fit the handrails.	2. Adjust the scaffold jacks until the upright of the handrails align properly.
3. The Deck Scaff adaptor does not fit into the legmaker (underneath the Deck provided for DSA's or Deck suspension).	3. Make sure that the right ledgers were used according to the Assembly Instructions and the Ledger and DSA layout diagram
4. Ramp uprights touch Landing or Main Stage uprights and there is no gap for the ramp to move close to the Landing or Main Stage to attach the Ramp Connecting Plates.	4. Make sure that the right ledgers were used according to the Assembly Instructions and the Ledger and DSA layout diagram
5. The Stage Ramp is Higher or Lower than the main Stage after assembly	5. The Stage Ramp is designed to start at 300mm from the Ramp first connection to the bottom of the Scaffold Jack. After that it will follow 300mm Increment heights at every connection for the handrails etc. to work out. This is why it is recommended to build the ramp first and then follow with the Main Stage on the same height.
6. The Handrails doesn't work out or the handrail upright doesn't align parallel after installation.	6. Start with a corner, for example: start where the Stage Ramp meets the Main stage with attaching the Handrails. Attach the first Handrail to the Ramp Connecting bracket that was used to attach the Ramp to the Stage. Attach the Handrail Connecting Bracket on the other end of the Handrail first and then attach it to The Stage Ramp. Make sure that all Handrail Connecting Brackets are connected with equal spaces between the Brackets and Deck Ends. The spaces should be around 10mm between Deck-end and the side of the Handrail Connecting Bracket nearest to the Deck-end. It is good practice to keep all the nuts on the square bolts for connecting the Handrail Connecting Brackets loose and only lock them after all the handrails was installed and properly spaced.