

TECHNICAL INFORMATION



Visiting companies should in all cases check with either the Head of Technical and Maintenance, Chief Electrician or Stage Manager to ensure the information contained herein is up to date and correct. At certain times some equipment detailed in this document may be temporarily unavailable.

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Please inform us immediately if your show floor is raised in excess of 200mm.

AUDITORIUM

Maximum capacity 1247.

Seating on four levels as follows:

Stalls:	506 seats (reduces according to pit layout – see below).
Grand Circle:	252 seats.
Upper Circle:	231 seats.
Gallery Amphitheatre:	66 seats.
Gallery:	194 seats.

Orchestra pit:

On three lifts able to accommodate up to 75 musicians.

Seating in the stalls can be varied as follows:

With a full-sized orchestra pit of 3 lifts (rows A - F removed) 11m x 8.1m	391 seats.
With medium sized pit of 2 lifts (rows A to D removed) 11m x 6.3m	431 seats.
With a small sized orchestra pit (row A and B removed) 11m x 4.4m	473 seats.
With just Row A removed. 11m x 3.7m	491 seats.

A sound control position in the rear stalls removes up to 30 seats in S, T & U rows, dependent on space required.

Wheelchair accessible spaces:

Up to 8 positions.

STAGE

Proscenium Stage	Raked of wooden construction
Rake	1:24
Setting line	Taken from line of safety curtain
Depth from setting line exc. Back Dock	11.40m
Depth from riser to setting line	1.00m

Back Dock	15.50m wide x
5.04m deep 7.580 aperture	
Proscenium Dimensions	9.01m wide x 9.53m high
Height to permanent Proscenium Pelmet	@ 6.90m
Height to underside Safety curtain	@ 7.30m
Wing depth	P.S. 4.38m O.P. 7.50m
Height to fly floor	P.S. 7.90m O.P. 6.20m
Height to pin-rail	9.3 m both sides
Height of SR dock	6.2m
Height of SL dock	7.4m
Height of back dock	6.8m
Distance between fly floors	11.90m

Flys

Working fly floor stage right	
51x Double purchase counterweight sets	
1x Single purchase for House Tabs	
Pelmet on winch set	
Length of flying bar	10.94m extending out to 11.9m
Flying height @ Bar 1	17.200m
Flying height @ Bar 52	16.700m
Max. Lifting Capacity.	400Kg.

STAGE EQUIPMENT

Drapes

	Width x Drop
5x Black Masking Borders	11.5m x 4m drop
5x Black Legs (Pairs)	4m x 7.7m drop
1x Black Full Backing	12m x 9m drop
1x pair Black Half Tabs	7.4m x 8m drop

All the Drapes above are without fullness

Other

- 2x Liftket 250Kg Rigging hoists low speed
- 2x Liftket 250Kg Rigging hoists high speed
- 3x Liftket 500Kg chainhoists in roofspace above pit area.
- 2x Liftket 250Kg chainhoists in roofspace above each proscenium.
- 1 Harlequin Black Dance Floor to cover performing area of 15m x 15m
- 1 upright piano for use in rehearsal room and stage

All rigging to be undertaken in conjunction with Theatre Royal in-house rigger. Contact lee.bowman@theatreroyal.co.uk

GET-INS AND GET-OUTS

- Loading doors to street on Shakespeare Street. Ramped access from Street down to Stage.
- Door Dimensions. 3.935m high x 2.995m wide
- 2x Ra'alloy ramps 1m wide x 4m long 750Kg SWL each

DRESSING ROOMS

Currently the room allocations are subject to occupancy restrictions. Please contact in advance for more information.

14 Dressing rooms with 31 showers and 2 bathrooms can normally accommodate up to 81 performers. All dressing rooms have televisions showing Freeview and a show relay picture. Please refer to our **[Backstage Floor guide](#)** for full plans of the Dressing Rooms.

Room number: Capacity (COVID-19)	Standard Capacity	Revised
1	1	1
2	1	1
3	2	1
4	2	1
5	6	3
6	5	2
7	8	3
8	4	4
9	12	6
10	8	4
11	8	4
12	6	3
13	8	4
14	6	3

All floors served by 16 person / goods lift, again currently subject to distancing restrictions.

N.B. Dressing room 8 has been risk assessed as unsafe for use by children due to the unsuitability of Fire Escape arrangements.

Due to traces of asbestos contained in the artex applied to some of the ceilings backstage, any drilling or other building work to these ceilings, whilst very low risk, is not permitted without the written authorisation of the Director of Operations.

There is a backstage accessible toilet and shower room and a platform lift from Stage Door to Stage for wheelchair users. There is no specified accessible dressing room – please contact the theatre for further information.

Free Wi-fi is available backstage.

BAND ROOMS

2x Band rooms. Can also double as studio for sound, & has audio, video, comms and speaker lines installed.

Band Room 1 is currently in use as a BOH Covid isolation room and is not available.

WARDROBE, LAUNDRY & WIGS

Wardrobe, Wigs and Laundry rooms available.

2x JLA washing machines

2x JLA drier

1x Ironing board

1x Steam iron

Facility for 2x touring washers or driers.

REHEARSAL ROOM

The Rehearsal Room (13.7m.x 9.1m) is situated BOH. It is used by the Theatre Royal's Learning department and must be kept clear. Availability can be checked and bookings requested by contacting Kim Hoffman, Head of Learning, on 0191 244 2500. learning@theatreroyal.co.uk

LIGHTING EQUIPMENT

Control Room Console	Auditorium / Designers Console
2x ETC Gio@5	ETC Gio
24576 intensity channels	4000 intensity channels

398x 3Kw ETC Sensor+ Dimmers
 40x 5Kw ETC Sensor+ Dimmers
 24x 3Kw Sine-wave Dimmers (separate universe)
 73x 3Kw ETC Sensor+ Relays
 8x Double ETC Sensor+ relay modules.

FRONT OF HOUSE equipment (All permanently rigged)

12x source4 15/30° 750W profiles in Gallery Lighting Slips.
 12x 14° Source4 750W profiles on Gallery Circle Front.
 12x 10° Source4 750w profiles on Gallery Bridge.
 10x source4 15/30° 750W profiles on Upper Circle Front.

Please note our FOH positions require some access involving harness use.

We do not have a Proscenium boom position but have technical facilities in the auditorium boxes closest to the stage for lighting and sound equipment. Please contact the Chief Electrician for further information.

Conductor's spots

For those productions that require a conductor, the theatre carries two spots, one either side of the Gallery slips to light the conductor's face and hands.

STAGE LIGHTING EQUIPMENT

12 x Strand Harmony F 1kW Fresnel
 12 x Strand Cadenza 2kW PC
 62 x Source4 750w heads with the selection of 3x 19°, 12x 26°, 33x 36°, 28x 50° fixed lenses, and 12x 15/30° or 12x 25/50° zoom lens tubes.
 44x Strand Punchlites (Parcans)
 106x Thomas type Parcans
 10x Strand Prelude F
 36x 1kW CCT Starlette Fresnels.

Cyclorama

Flood bar	20x CCT 1kW Asymmetric Floods.
Flood Bar/Groundrows	23x Strand Coda 500/4

FOLLOW SPOTS

2x 1.8kW HMI Robert Juliat Victors with Peltor headsets.
 Both centre of Gallery circle front. N.B. Not enclosed.
 Additional followspot positions must be arranged in advance. Please contact the Chief Electrician.

COLOUR FRAME SIZES

Robert Juliat Victor 215 x 215 mm
 CCT Starlette F 185mm x 185mm
 Strand Cadenza 2k PC/Profile
 Punchlite 245 x 245mm
 Strand Harmony 185 x 185mm
 Thomas Parcan 255 x 255mm
 ETC Source 4 155 x 155mm
 ETC Source 4 14degree and Source 4 zoom 185 x 185mm
 Strand Coda 260 x 230mm

CCT Asymmetric Flood 400 x 280mm
Strand Prelude 150 x 150mm.
Gobo holders and irises are available. Please contact regarding sizes and lantern-types.

LX RIGGING

8 x lighting boom bases: height dependent on rigging positions.
3 x 7'6" 6 way internally wired bars to Socopex.
Several 4'6" Seekol floorstands and bench-bases.
3 x 2.5m powerdrive stand.

EFFECTS MACHINES

1 x JEM ZR22 DMX smoke machine
2 x HazeBase Pro hazers.
1 x Look Solutions Power Tiny handheld smoke machine.

ALL SPECIAL EFFECTS MUST BE REQUESTED AND APPROVED IN ADVANCE.
Consumables for these machines will be chargeable

Houselights are LED and require a separate universe of DMX. Merge files for GrandMA and ETC consoles can be provided.

POWER SUPPLIES

Stage Left Dock area on auxiliary power panel

240V single phase, 50 hertz onstage and throughout building
240V single phase supply, 63A, 32A Ceeform
415V 3PNE 63A, 32A Ceeform
240V 125A single phase x 2 Ceeform
415V 3PNE 200A per phase Powerlock x 2

Stage Left Fly floor

200 amp 3 phase Distribution panel fed from one of the Powerlock supplies on stage left panel.
240v single phase supply, 32A Ceeform x 2
240v single phase supply, 16A Ceeform x 2
415V 3PNE 125A, 63A & 32A Ceeform
415V 3PNE 200A per phase Powerlock
Total loading must be no more than 200amp per phase

Stage Right

200A 3 phase Distribution.
240v single phase supply, 32A Ceeform x 2
240v single phase supply, 16A Ceeform x 2
415V 3PNE 125A, 63A & 32A Ceeform
415V 3PNE 200A per phase Powerlock
Total loading must be no more than 200amp per phase

SOUND EQUIPMENT

Control

48ch. Avid Venue D-Show Profile mixing desk.
2 x MD recorders
1 x DAT recorder

1 x Yamaha SPX 1000 FX
1 x Yamaha Rev 500
2 x CD Player
4 x Stereo Graphics

Main P.A

8x d&b Yi7 or Yi10 on the Proscenium.

Subs: 2x d&b B2s, 4x d&b Q1s.

Foldback: 4x d&b E12s, 4 x Sherman wedge monitors. 4x JBL Control 1s.

Frontfills: 4x d&b E6s.

Sidefills: 6x d&b E3s.

Delays: 14x d&b E0s. 3x d&b 10S-Ds in the Gallery. Permanently rigged

Amps: 11x d&b D6 or 10D for main PA, foldback and delays and 2x d&b D12 for Subs

Also 3x Yamaha P7000, 3x Yamaha P3500.

Microphones: A large selection available.

We have a comprehensive wiring system for surround sound, but have no dedicated amplifiers or speakers for this.

Music stands

13x RAT stands with light fitting.

Communications

4 Channel RTS ring intercom 15 wired & 8 HME radio headsets

18x Cuelights (First 8 fixed position on Cue desk, next 10 patchable)

FOH and M.D. Video

2x B/W Monitors. 3x Colour monitors.

Please inform us immediately if your show floor is raised in excess of 200mm.

Please note due to the narrow Proscenium opening we do not support Prosc Booms.

We have a 250kg motor for line array pick-ups either side of the auditorium. Please advise if you are touring arrays in excess of 250kg.