

# ROYAL CONCERT



Exterior at Night. Photograph: Christine Ottewill



by Bob Anderson

**S**UDDENLY, new concert halls are in fashion. The Barbican Hall in the City of London, the St. David's Hall in Cardiff and, in Nottingham, the Concert Hall at the Royal Centre all opened during 1982. Assessment and comparison of these buildings from the point of view of musicians and architects can be found in daily and weekly newspapers and in the

professional magazines. This report deals with features of the Nottingham Hall that should be of special interest to readers of *Tablets*, the facilities provided for staging concerts, touring pop, music and dance, trade shows and conferences.

Right from the start the client, Nottingham City Council, knew that what they wanted was a hall to stage all types of big event. Big events, that needed an audience of 2000 or more to pay their way and for which the performers and their audiences expect and require good staging and front of house facilities. The City of Nottingham already owned and managed the Theatre Royal, reconditioned and modernised in 1978, and the site alongside had been earmarked for a concert hall. Nottingham certainly needed a home for classical music, but, so decided the City Fathers, Nottingham also should have a venue for the big popular touring rock bands, the big name singing stars, and all the other large scale touring spectacular shows ranging from Russian choirs to Chinese acrobats. The question was, could a building be devised

that would accommodate such a variety of use and yet be judged top rate by all types of performer? Following the notable success of the Theatre Royal project, the client appointed the same architect, Renton Howard Wood Levin Partnership and theatre consultant, Theatre Projects Consultants, to design the Concert Hall.

The first and fundamental question was, how could the acoustics be designed to satisfy orchestras using classical instruments and groups using electronic sounds. The acoustician appointed was Russell Johnson of New York, who had already gained much experience solving similar problems in the USA. His advice led to a classical end stage concert platform without a fly tower and with a massive (the world's largest) acoustic reflector suspended over the platform to give ideal sound for classical works. To deaden the response for electronic music, sound absorbing cloth acoustic banners can be lowered to cover the large areas of reflecting wall surface. The theatre consultants had therefore to concentrate on providing good staging

facilities without the possibility of conventional flying or a proscenium.

**F**IRST, consider the problem of the platform. All users will want to do a fast get-in from pantechonics and an equally fast get-out. Many will be one day events and time wasted loading and unloading is lost forever. A good get-in, scene dock and stage access are therefore essential. But a classical concert with chorus must also have seats for 180 or more singers surrounding the orchestra and the rear of the platform should ideally be acoustically reflective, not absorbing. Bleacher seating units on air palletes together with folding wooden reflector screen side masking on tracks proved to be the answer in providing a quick access from the get-in dock to the platform area.

Flying is, of course, going to be difficult with the acoustic reflector suspended irremovably above the stage. But this reflector, or canopy, also has to raise and lower and tilt to adjust the acoustic to suit the needs of the performance.

*Client:*  
John Haslam, Director of Technical Services, City of Nottingham  
*Architects:*  
Renton Howard Wood Levin Partnership  
*Theatre Consultants and Acousticians:*  
Theatre Projects Consultants Ltd.

*Services Engineers:*  
Ove Arup and Partners  
*Quantity Surveyors:*  
Gleeds (Nottingham)  
*Main Contractors:*  
Bovis Construction Limited

**For Theatre Projects Consultants Limited**  
*Director in Charge:*  
Richard Pilbrow  
*Project Leader:* Jeremy Godden  
*Acoustics:* Russell Johnson & Nick Edwards  
*Stage Equipment:* Ray Carter