# HURREN LANGMAN & JAMES COLLECTION

**Bridges, Culverts, Fish lookouts, Roads, Curbing and Pathways, radio masts, S256**

The engineering partnership of Hurren, Langman and James consisted of Frank Hurren ASASM (1899-1992), William Wilson Langman and Wesley Hughes James ME (Adel), FSASM, MIE Aust, (b1898). “During 1928 Hurren established the first sustained consulting structural engineering practice in Adelaide to meet the small but growing need for more specialised reinforced concrete structural expertise. His practice survived the hard years of the Depression due to [Hurren’s] drive and self-motivation. For over twenty years, the practice of Hurren, Langman and James was the pre-eminent consulting structural engineering firm in Adelaide, highly respected for its innovation and the quality of its work” (Stacy 2005 p87). On 10 August 1956, on the retirement of Frank Hurren, the partnership of Hurren, Langman and James was dissolved. James and Langman continued as Langman and James from 1 July 1956.

Frank Hurren studied at the S.A. School of Mines and Industries then worked in Sydney. On his return to Adelaide he worked with both E. Stone and M.S. Stanley, and later, in partnership with Langman and James he designed the structures of many Adelaide buildings, such as Shell House, Elizabeth House, the Bank of N.S.W. and the Savings Bank Building. William (Bill) Langman was Mayor of Burnside 1967-68 and was very active in the Adelaide Rotary Club. Wesley Hughes James studied at the University of Adelaide and became a Junior Assistant Engineer in the Engineer-in Chief's Department in 1922. He then went to England and America, returning to Adelaide in 1927 where he gained the Degree of Master of Engineering in 1931. James worked with W. Francis before joining with Hurren and Langman, where he designed such structures as the Pt. Augusta and Osborne Power Stations. He was Chairman of the Institution of Engineers (S.A. Division) in 1944 (Cumming and Moxam 1986).

**Key references**

Cumming, D.A. and Moxham, G. (1986) *They Built South Australia*. Self published, South Australia.
Stacy, Bill. “'A mad scramble': Frank Emery Hurren, consulting structural engineer”. *Journal of the Historical Society of South Australia*, no.33, 2005: 87-101.
Bill Stacy, 'Hurren, Frank Emery (1899 - 1982)', *Australian Dictionary of Biography*, Volume 17, Melbourne University Press: 563-564.

**Collection description**

Hurren, Langman and James were a structural engineering firm who worked with many architectural firms in South Australia and interstate. This collection of records came from the Mortlock Library of South Australiana, at the State Library of South Australia as a specialist group of business records. It consists of plans and drawings, calculations for jobs, correspondence, specifications and books. As these records, when accessed by the archivists, had no discernible order, they have been organised into groups related to the functions of the buildings described, then the owner's name. They are a valuable addition to the Architecture Museum because they contain work by architects not previously represented in the collections. Plans are stored in plan file drawers unless designated as 'Box' when they are stored in the archive boxes.

# HURREN LANGMAN & JAMES COLLECTION

**Items in Series Order**

| Series No | Project | | | | |
|---|---|---|---|---|---|
| S256/1/1- | Road, Fauldings factory | | | | |
| S256/2/1- | Camera Eye Tower, | | | | |
| S256/3/1- | Pipes, Hansen & Yuncken | | | | |
| S256/4/1- | Bridge, Lyndoch | | | | |
| S256/5/1- | Fish Lookout, Sellicks Beach | | | | |
| S256/6/1- | Decker Oven, no location | | | | |
| S256/7/1- | Adelaide Bridge, King William Rd | | | | |
| S256/8/1 | Radio Mast 5KA | | | | |
| S256/9/1 | Radio Mast 5AD | | | | |
| S256/10 | TV Tower, Perth, 1959 | | | | |
| S256/11 | Torrens Lake Sluice Gate 1928 | | | | |
| S256/12 | Glenelg seawall repairs 1938 | | | | |
| S256/13 | Concrete rainwater tank 1937 | | | | |
| S256/14 | Innes Bell test floor | | | | |
| S256/15 | Foreshore improvements at Glenelg 1929 | | | | |
| S256/16 | Strengthening Seawall at Glenelg 1953 | | | | |
| S256/15 | River Broughton floodwaters plan | | | | |
| S256/16 | PMG Dept 200ft Tower | | | | |
| S256/17/1-34 | 5DN, 5RM Radio Station Aerial Masts | Commerce House, Featherstone Pl., Adelaide; CML Building, King William St, Adelaide; Springcart Gully, Renmark | McMichael & Harris; Caradoc Ashton | n.d.; 1935 | 1-10 sketches; 11-34 calcs |
| S256/18/1-3 | Sea Wall, Retaining Wall | Corporation of Glenelg | Caradoc Ashton & Fisher | 1938 | 1 sketches; 2-3 sections |
| S256/19/1 | Beach Shelter | Corporation of | Caradoc | 1953 | 1 |

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|---|---|---|---|---|---|
| | | Glenelg | Ashton, Fisher & Beaumont-Smith | | sketches |
| S256/20/1 | Dressing Rooms | Corporation of Glenelg | Caradoc Ashton, Fisher & Beaumont-Smith | 1953 | 1 sketches |
| S256/21/1-5 | Australian Gypsum Products Pty Ltd | | Innes Bell Flat Slab System | 1932 | 1-2 plan, section; 3-4 samples; 5 sketch |
| S256/22/1-2 | Trilok Steel Decking | Typical application | J Lysaght (Australia) Pty Ltd | 1960 | 1-2 diagrams |
| S256/23/1-3 | True Plug products | Typical applications | True Plug Co., Albion St, Sydney | n.d. | 1-2 diagrams; 3 booklet |
| S256/24/1-3 | 5PI Radio Station Aerial Mast | Crystal Brook | | 1937-44 | 1 sketches; 2-3 structure |
| S256/25/1-5 | 5KA Radio station Aerial Mast | Franklin St, Adelaide | | 1944 | 1 sketches; 2-5 structure |
| S256/26/1 | E&WS Department, Tank | Belair | E&WS Department | 1942 | 1 structure |
| S256/27/1-4 | E&WS Department, Sluice Gate seals | Murray Mouth Barrages | E&WS Department | 1939 | 1-2 spec.; 3 sketches; 4 details |
| S256/28/1-15 | SA Farmers' Union Ltd, Signage | Mile End | Garlick & Jackman | 1938 | 1 sketch |

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| | | | | | ; 2 structure; 3-5 draft letter; 6-7 typed letter; 8-15 calcs |
| S256/29/1-2 | Courier Mail Building, Radio Aerial Mast | Brisbane, Queensland | H W Atkinson and A H Conrad in association with Stephenson & Meldrum (Victoria) | n.d. | 1-2 structure |
| S256/30/1-2 | 5AD Radio Station Aerial Mast | Advertiser Building, King William St, Adelaide | | n.d. | 1-2 sketches |
| S256/31/1 | Radio Aerial Mast for SA Fire Brigades Board | Savings Bank of SA Bldg, King William St, Adelaide | McMichael & Harris | 1952 | 1 struct'l |
| S256/32/1 | Tank Stand | | Rheem Australia Pty Ltd | 1971 | 1 struct'l |
| S256/33/1-2 | Botanic Gardens, tanks | North Tce, Adelaide | | 1965 | 1-2 struct'l |

# HURREN LANGMAN & JAMES COLLECTION

| SERIES | DESCRIPTION | DATE | PERSONNEL |
|---|---|---|---|
| S256/1/1 | Concrete road at Fauldings factory. Includes plan and calculations of materials needed. Marked 94(45) | April 1945. | Hurren Langman & James |
| S256/2/1 | Camera Eye Tower. Calculations of materials needed. Marked 27 (47) | 1947 | Glover & Pointer, Engineers. |
| S256/3/1 | Calculations for roof trusses for building for Hansen & Yuncken, revised for Hume Pipes. Marked 4 (46) | 1946 | Hurren, Langman & James |
| S256/4/1 | Calculations for bridge for A F Kies at Lyndoch. Includes plan. Marked 109 (39) | Dec 1939 | Hurren, Langman & James |
| S256/5/1 | Calculations for Fish Look-out Tower at Sellicks Beach. Marked 20 (46) | 1946 | Hurren, Langman & James |
| S256/6/1 | Plan for Vienna and semi scotch oven showing front elevation and sections. Blueprint. Drawer | n.d. | Small & Shattell, Melbourne |
| S256/6/2 | Plan for semi Scotch oven showing front elevation and sections. Blueprint. Drawer | n.d. | Small & Shattell, Melbourne |

**Adelaide Bridge, 1929** **S257/7/1**

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|---|---|---|---|
| S256/7/1 | Adelaide Bridge. Driving details for test piles. Blueprint. Drawer. | n.d. | R W Scott, City engineers |
| S256/7/2 | Adelaide Bridge. Contour plan of existing Adelaide Bridge. Blueprint. Drawer | 1/2/1929 | R W Scott, City engineers |
| S256/7/3 | Adelaide Bridge. Plan of existing bridge showing half plan, section at abutment and cross section. Blueprint. Drg no 2. Set no 6. Drawer. | 16/11/1926 | R W Scott, City engineers |
| S256/7/4 | Adelaide Bridge. Tramways loading and bores etc. Blueprint. Drg no 4 Set no 6 Drawer | 16/11/1926 | R W Scott, City engineers |
| S256/7/5 | Adelaide Bridge. General elevation and plan showing order of construction. Drg no 6. Blueprint. Drawer | 1/2/1929 | R W Scott, City engineers |
| S256/7/6 | Adelaide Bridge. Abutments sheet No 1. Blueprint. Drg no 7 Set no 6. Drawer | 1/2/1929 | R W Scott, City engineers |
| S256/7/7 | Adelaide Bridge. Plan of decking, sheet no 1. Blueprint. Drg no 13. Set no 8. Drawer | 1/2/1929 | R W Scott, City engineers |
| S256/7/8 | Adelaide Bridge. Transverse section of existing bridge. Blueprint. Drg no 3 Set no 8 Drawer | n.d. | R W Scott, City engineers |
| S256/7/9 | Adelaide Bridge. Abutments Sheet no 2. Blueprint. Drg no 8 Set no 8 Drawer | 1/2/1929 | R W Scott, City engineers |
| S256/7/10 | Adelaide Bridge. External main arches. Blueprint. Drg no 10 Set no 8 Drawer | 1/2/1929 | R W Scott, City engineers |
| S256/7/11 | Adelaide Bridge. End retaining walls. Blueprint. Drg no 12 Set no 8 Drawer | 1/2/1929 | R W Scott, City engineers |
| S256/7/12 | Adelaide Bridge. Plan of decking. | 1/2/1929 | R W Scott, City |

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| | Sheet no 3. Blueprint. Drg no 15 Set no 8 Drawer | | engineers |
| S256/7/13 | Adelaide Bridge. Plan of decking. Sheet no 4. Blueprint. Drg no 16 Set no 8 Drawer | 1/2/1929 | R W Scott, City engineers |
| S256/7/14 | Adelaide Bridge. Plan of decking. Sheet no 5. Blueprint. Drg no 17 Set no 8 Drawer | 1/2/1929 | R W Scott, City engineers |
| S256/7/15 | Adelaide Bridge. Test piles driven at Adelaide Bridge. Blueprint. Drg no 5 Set no 10 Drawer | 4/4/1928 | R W Scott, City engineers |
| S256/7/16 | Adelaide Bridge. Internal main arches. Blueprint. Drg no 9 Set no 10 Drawer | 1/2/1929 | R W Scott, City engineers |
| S256/7/17 | Adelaide Bridge. Approach bow string arches. Blueprint. Drg no 11 Set no 10 Drawer | 1/2/1929 | R W Scott, City engineers |
| S256/7/18 | Adelaide Bridge. Lamp standards and pilasters. Blueprint. Drg no 18 Set no 10 Drawer | 1/2/1929 | R W Scott, City engineers |
| S256/7/19 | Adelaide Bridge. Pylons and side retaining walls. Blueprint. Drg no 19 Set no 10 Drawer | 1/2/1929 | R W Scott, City engineers |
| S256/7/20 | Adelaide Bridge. Plan of decking. Sheet no 2. Blueprint. Drg no 14 Set no 13 Drawer | 1/2/1929 | R W Scott, City engineers |

# HURREN LANGMAN & JAMES COLLECTION

**Radio Mast 5KA, 1944** **S257/8/1**

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|---|---|---|---|
| S256/8/1 | Radio Mast 5KA. (also called a vertical steel radiator) Calculations for erection of radio mast for station 5KA in Franklin St, Adelaide. NB Same calculations used in part for S256/9/1. Mast later moved to Central Mission Building (1943) Marked 108(47). Box. | 1944-47 | Hurren Langman & James |

# HURREN LANGMAN & JAMES COLLECTION

**Radio Mast 5AD, 1943** **S257/9/1**

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|---|---|---|---|
| S256/9/1 | Radio mast for station 5AD. Calculations and costs for radio mast erected on top of Richard's building above highest point of roof. NB Same calculations used in part for S256/8/1. Marked 108 (47). Box. | 1940-43 | Hurren Langman & James. Steeple Jack, Henry Bowden. |

**S257/10**

S256/10

**Torrens Lake, Sluice Gate** **S257/11**

| | | | |
|---|---|---|---|
| S256/11 | Torrens Lake, sluice gate | 1928 | City Engineer and Surveyor |

**Glenelg Seawall** **S257/12**

| | | | |
|---|---|---|---|
| S256/12 | Glenelg Seawall, for Glenelg Town Council, repairs to seawall, new seawall, cross section | 1941 | Hurren Langman and James |

# HURREN LANGMAN & JAMES COLLECTION

**Concrete Rainwater tank** **S257/13**

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|---|---|---|---|
| S256/13 | Concrete Rainwater tank | 1937 | Walter J. White |

# HURREN LANGMAN & JAMES COLLECTION

**Innes Bell test floor** **S257/14**

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|---|---|---|---|
| S256/14 | Innes Bell test floor | n.d. | Hurren Langman and James |

# HURREN LANGMAN & JAMES COLLECTION

| **River Broughton floodwaters plan** | | | **S256/15** |
|---|---|---|---|
| S256/15/1-16 | E & WS Department<br>River Broughton floodwaters plan and specifications for the Lower River Irrigation Trust | 1937 | Hurren Langman and James |