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## **Wunderlich ceramic glazed structural blocks : a wall and ceramic finish in one**

AUTHOR(S)

Wunderlich Limited

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HANDLE

[10536/DRO/DU:30122193](#)

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# A WALL and CERAMIC FINISH in ONE!

- STRUCTURALLY STRONG
- BRICK AND FACING TILE COMBINED
- GLAZED ON ONE OR MORE FACES
- PERMANENTLY COLOURFUL AND HYGIENIC
- IMPERVIOUS TO DIRT AND GREASE
- EASILY MAINTAINED—NO PAINTING
- MODULAR IN SIZE
- SPEEDILY ERECTED—SAVES TIME, LABOUR AND COST

*Single faced G.S.B.s*

*123/6 per sq yd.*

*Double face 136/6*

*per sq yd.*

**Wunderlich**  
**CERAMIC GLAZED STRUCTURAL BLOCKS**  
**A WALL AND CERAMIC FINISH IN ONE**

*Terra 2" material is 10/- sq ft.*

*4" material special is approx*

*21/-  
sq ft.*



# Wunderlich

## CERAMIC GLAZED STRUCTURAL BLOCKS

### A WALL AND CERAMIC FINISH IN ONE

**DESCRIPTION:** Colourful glazed architectural modular structural building units, strong in section—hollow brick and facing tile combined, ceramic glazed on one or more faces, weather, grease stain and fire resistant, easily cleaned, easy to erect (one trade only involved) permanent wall and partition medium. Economical in initial cost and application.

**MANUFACTURE:** Glazed Ceramic Structural Blocks are made from buff clay, extruded through dies to standard shapes, cut into lengths, sprayed with true ceramic glazes then kiln fired to flux the glaze to the clay body.

**STRENGTH:** Ceramic Glazed Structural Blocks are by test capable of withstanding higher compressive loads than are ordinary building bricks—see page 7.

**USES:** Ceramic Glazed Structural Blocks find wide use in new construction and in alterations to existing buildings. The glazed single faced units are used as the exterior or interior skin of cavity walls, or alternatively as an internal walling (corridors and partitions) where only one side is required glazed; the glazed double faced blocks are particularly suitable for partition walls and similar features that require a colourful glazed impervious and hygienic surface on both sides. Commercial, industrial and public buildings, shops, hotels, offices, flats, theatres, factories, store rooms, food and beverage processing plants, cool stores, workrooms, canteens, shower and toilet rooms, gymnasiums, schools, hospitals, power and service stations, banks, etc., all find ready application for Glazed Structural Blocks. They are ideal also for lining the walls and floors of swimming pools.

They can also be readily adapted to home construction to provide tile surfaced walls to bathrooms and kitchens.

**UNIT SIZES (Nominal):** Ceramic Glazed Structural Blocks are modular in size—see details on following pages. The standard single faced blocks are 11 $\frac{3}{4}$ " long, which, plus the recommended  $\frac{1}{4}$ " joint, result in a 12" module. The height of 6 $\frac{1}{2}$ " is equivalent, when laid, to two courses of 3" brickwork whilst the 5" width is equivalent to a 4 $\frac{1}{2}$ " building brick plus one  $\frac{1}{2}$ " coat of cement render. The standard double faced block varies only in that it is 5 $\frac{3}{16}$ " wide, equivalent to a 4 $\frac{1}{2}$ " building brick plus two coats of cement render.

Half blocks, both single and double faced, are 5 $\frac{3}{4}$ " long, two of which, plus a  $\frac{1}{4}$ " joint, equal one standard block when laid.

**APPEARANCE:** Ceramic Glazed Structural Blocks make bright walls that cheerfully stimulate the occupants. The glazed colours available are chosen to create surroundings that aid lighting, improve vision and increase productivity.

**COLOUR:** Comprises a standard range of lustrous or matt glazed colours and pastels, some plain, some mottled, as illustrated on the front page. These are:—

- |                  |            |                |
|------------------|------------|----------------|
| 1. Ivory         | 5. Yellow— | 9. Blue—Pale   |
| 2. Cream mottled | Sunshine   | 10. Blue—Royal |
| 3. White         | 6. Coral   | 11. Green—Pale |
| 4. Black         | 7. Tan     | 12. Green—     |
|                  | 8. Magenta | Mottled        |

With all ceramic glazes a slight irregularity of colour can be anticipated.

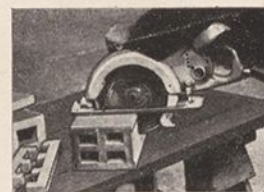
**MAINTENANCE:** Apart from periodical washing down to remove surface dirt, maintenance is nil.

**TRIM:** Ceramic Glazed Structural Blocks are virtually complete within themselves. However, if required, simple mouldings are available. Distinctive effects are obtained by the use of colour in bands, etc.

**DESIGN:** When designing for Ceramic Glazed Structural Block, adopt the modular set out as shown by service sheet No. 7155 on page 6 and vertical course heights on page 7, to avoid cut blocks and ensure faultless appearance.

**FIXING:** Set as for brickwork, using cement mortar in the proportion of one part of cement,  $\frac{1}{4}$  part lime, to three parts of clean sand. The addition of lime results in a plastic and workable mortar, that is desirable when setting Glazed Structural Blocks. Soak the blocks in water. Adopt a  $\frac{1}{4}$ " wide joint. Point all joints with mortar, coloured if desired, to finish flush with surface of blocks. Wash down work on completion.

**CUTTING:** Ceramic Glazed Structural Blocks can be cut, if necessary, with a Black & Decker Electric Power Saw fitted with a special 7" carborundum grit cutting wheel.



**PACKING AND DESPATCH—WEIGHT:** Ceramic Glazed Structural Blocks are packed for shipment or despatch by rail, as required. When packed in crates the following shipping weights and measurements apply (approx):

Single faced—per square yard—310 lbs. or 6 $\frac{1}{2}$  cu. ft.

Double faced—per square yard—340 lbs. or 7 cu. ft.

**Weight—Unpacked:** Average weight per block—15 lbs. single faced, 16 lbs. double faced.

Number of blocks per **square yard of face:** 15.8 blocks single faced, 7.9 sq. yds. double faced.

Number of **square yards of face** per ton 9.5 sq. yds. single faced, 19 sq. yds. double faced.

Number of blocks per ton: 150 blocks single faced, 140 blocks double faced.

**DAMAGE:** Responsibility is not accepted for blocks damaged or broken in transit.

**IMPORTANT:** Architects, engineers and builders contemplating the use of Ceramic Glazed Structural Blocks on major projects are requested to confer with us relative to their requirements and to the requirements of local building codes.

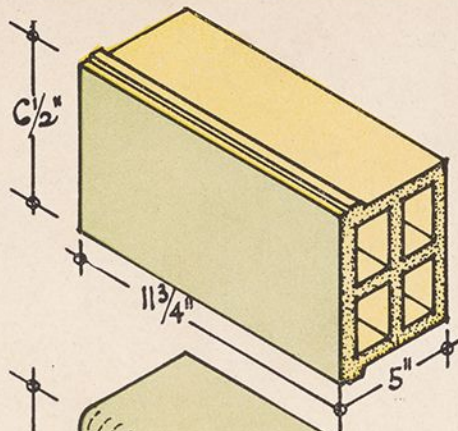




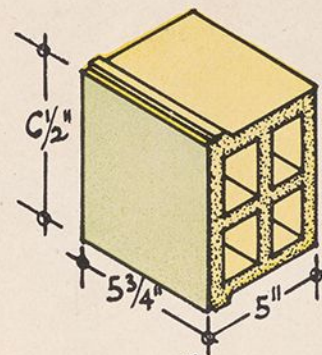




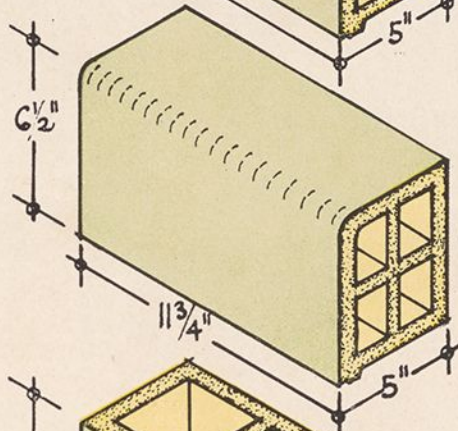




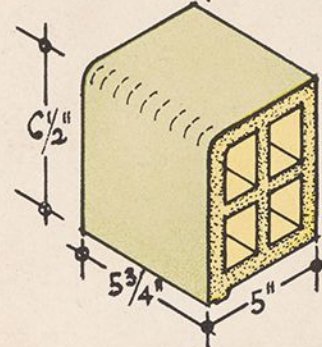
STANDARD  
BLOCK



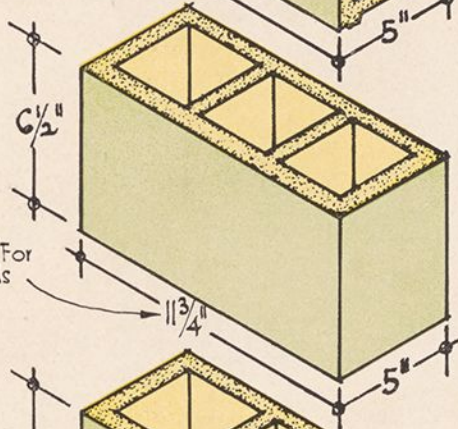
STANDARD HALF  
BLOCK . .



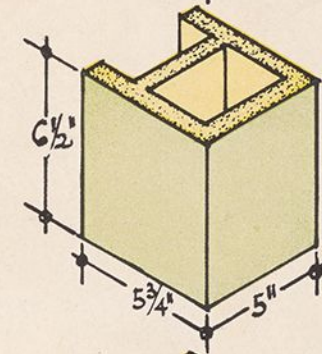
BULLNOSE  
BLOCK



BULLNOSE HALF  
BLOCK . .

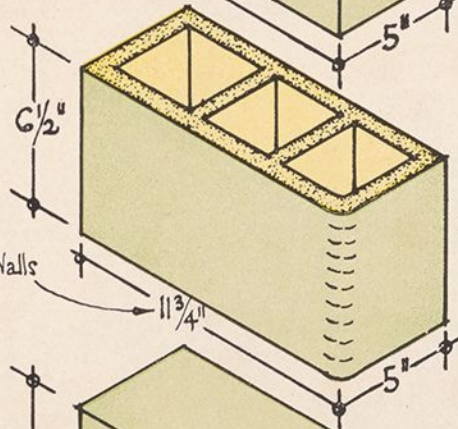


END  
BLOCK

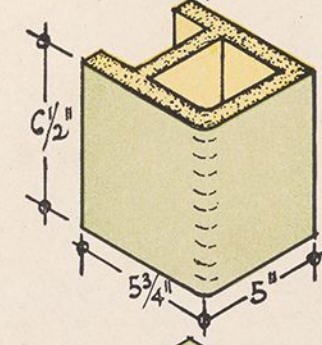


END HALF  
BLOCK .

Cut To 11" For  
Return Walls

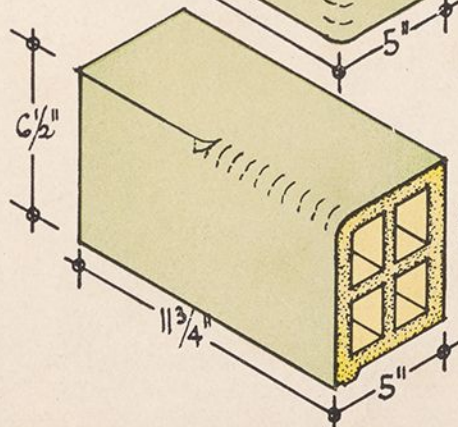


BULLNOSE END  
BLOCK

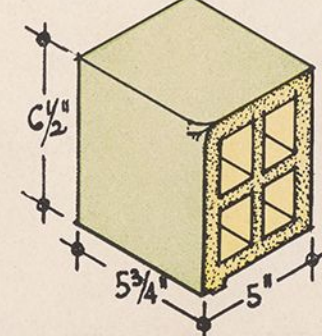


BULLNOSE END  
HALF BLOCK

Cut To 11" For  
Return Walls



BULLNOSE MITRE  
BLOCK L & R Hand



BULLNOSE MITRE  
HALF BLOCK L & R  
Hand.

SCALE  
1 1/2" = 12"

SERVICE SHEET NO 7156 .

CERAMIC GLAZED  
STRUCTURAL BLOCKS SINGLE FACED

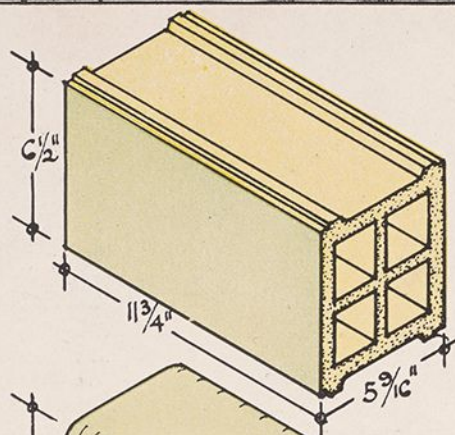
WUNDERLICH LIMITED .

TRADE

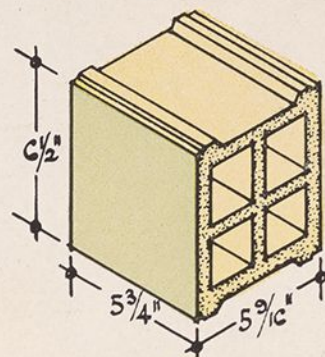


MARK

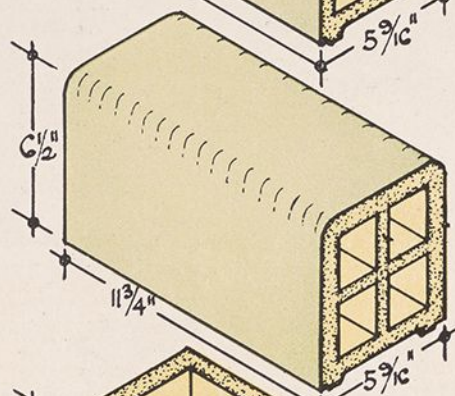




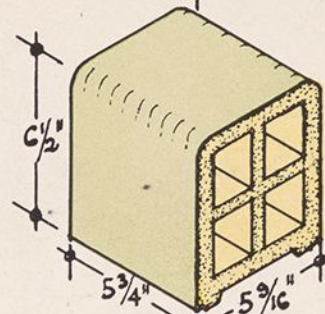
STANDARD BLOCK



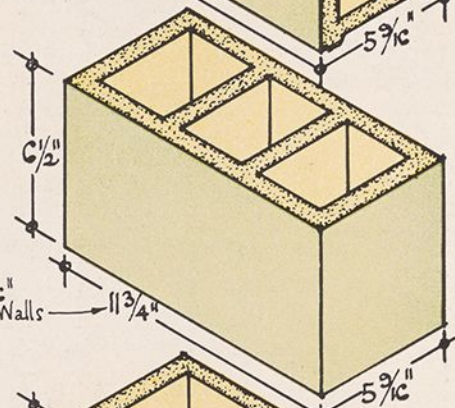
STANDARD HALF BLOCK



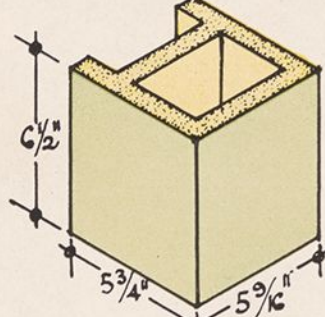
DOUBLE BULLNOSE BLOCK



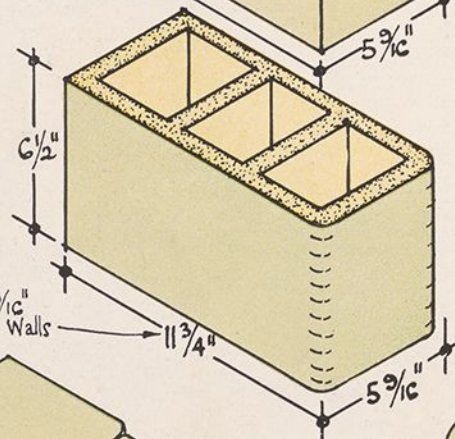
DOUBLE BULLNOSE HALF BLOCK



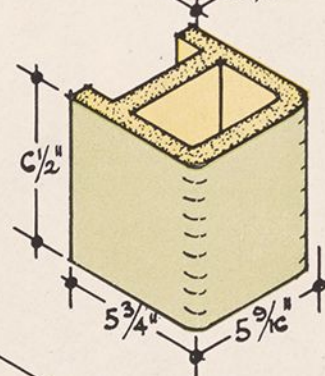
END BLOCK



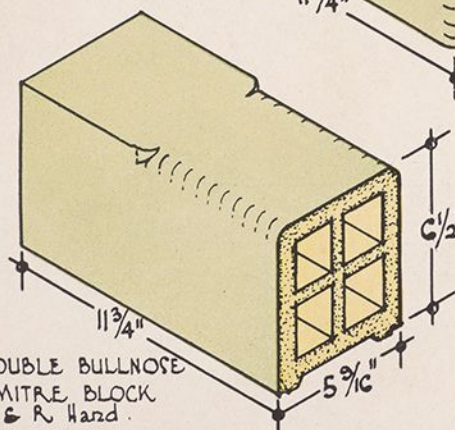
END HALF BLOCK



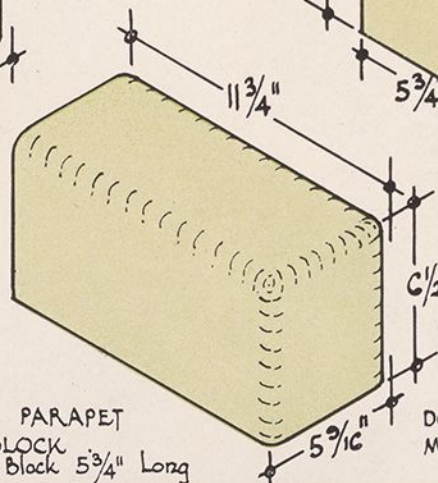
DOUBLE BULLNOSE END BLOCK



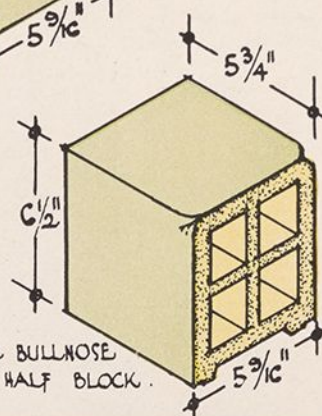
DOUBLE BULLNOSE END HALF BLOCK



DOUBLE BULLNOSE MITRE BLOCK L & R Hand



END PARAPET BLOCK Half Block 5 3/4" Long



DOUBLE BULLNOSE MITRE HALF BLOCK

SCALE  
1 1/2" = 12"

SERVICE SHEET NO 7157.

CERAMIC GLAZED  
STRUCTURAL BLOCKS - DOUBLE FACED

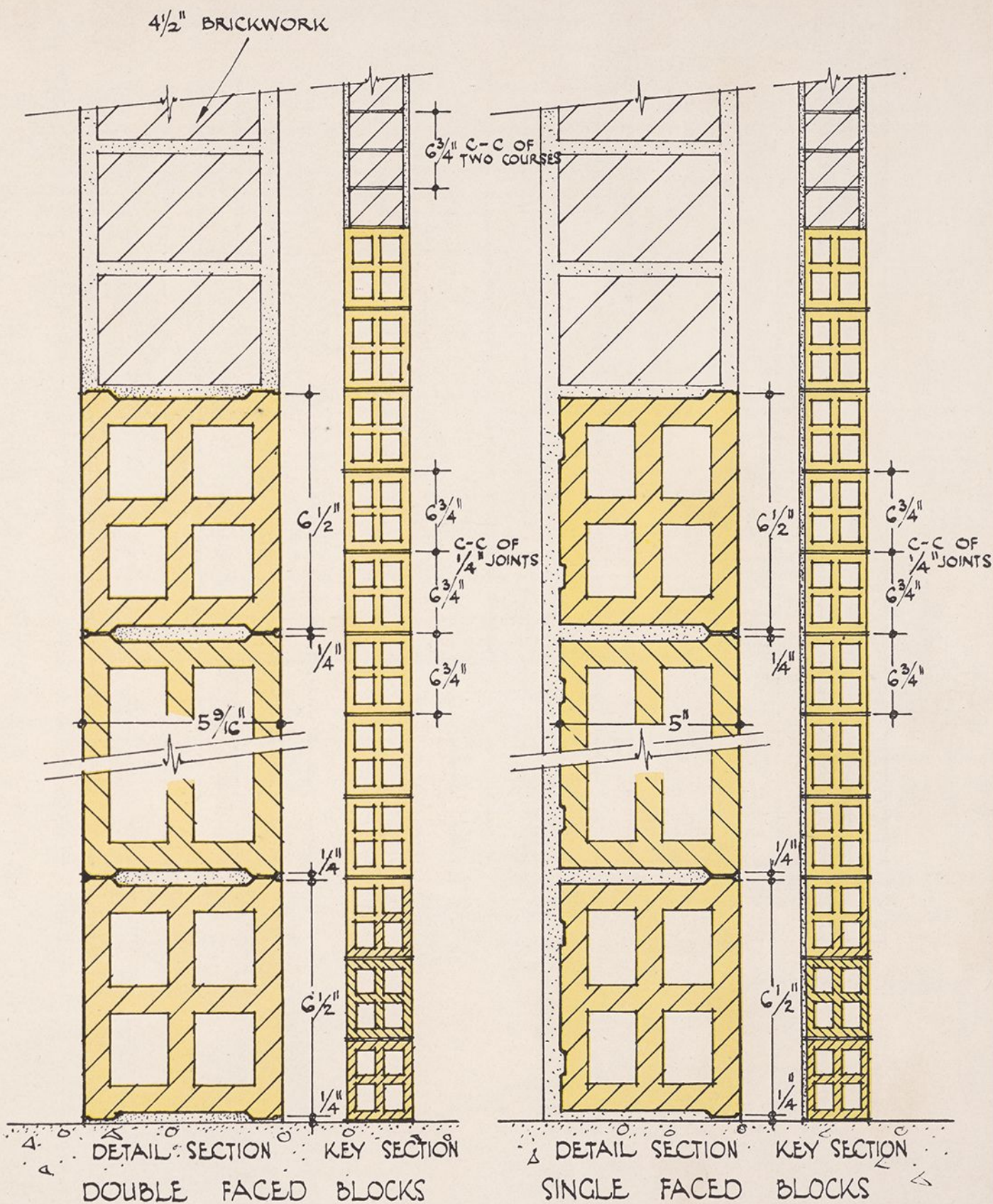
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MARK.





SCALES  
3" & 1" = 12"

SERVICE SHEET NO 7152

CERAMIC GLAZED STRUCTURAL BLOCKS  
SECTIONAL DIMENSIONS OF BLOCKS & JOINTING

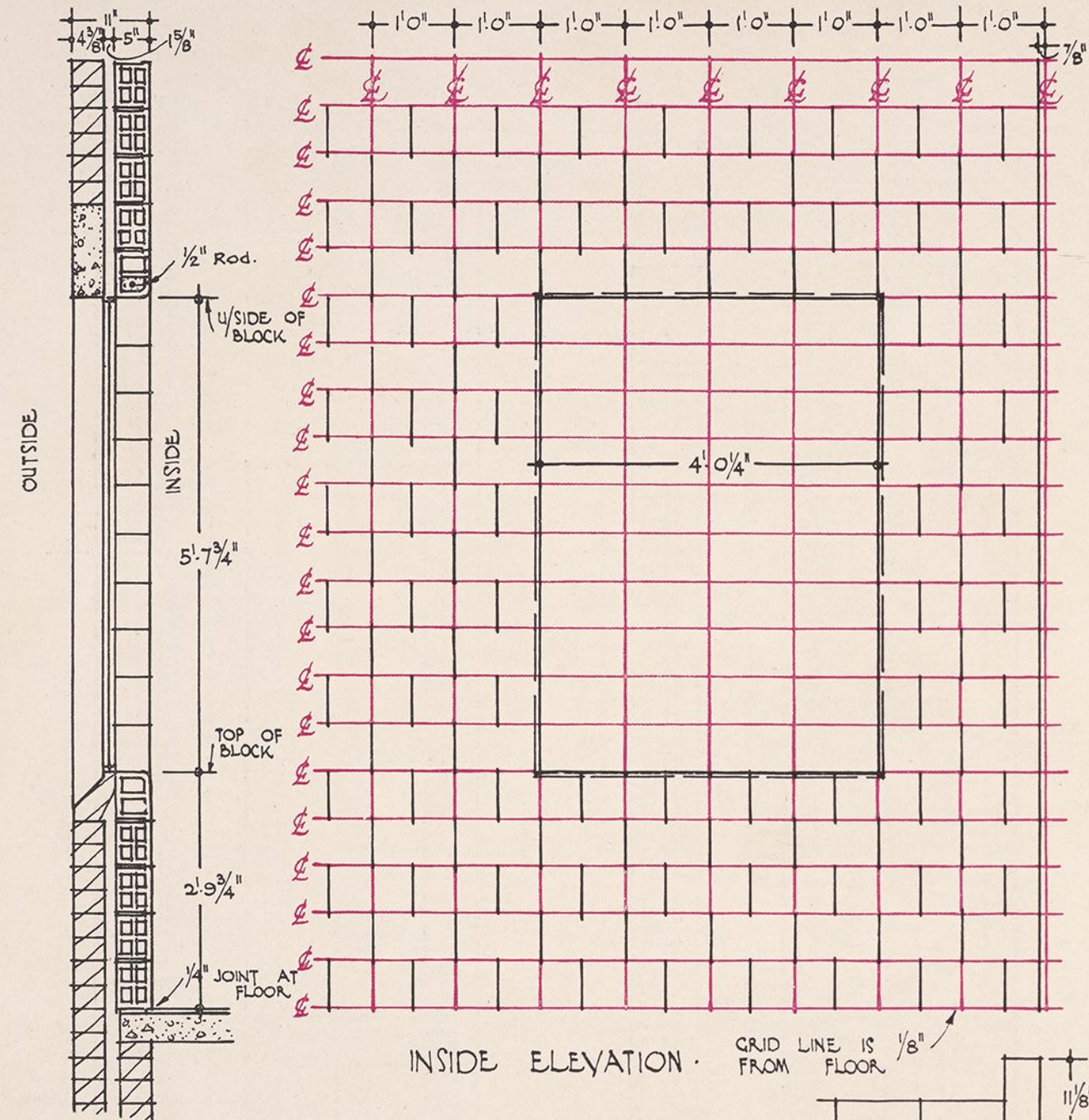
WUNDERLICH LIMITED

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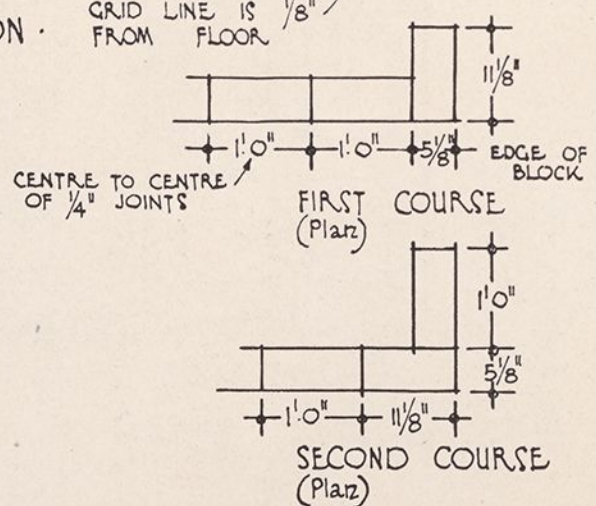




INSIDE ELEVATION . GRID LINE IS FROM FLOOR  $\frac{1}{8}$ "

VERTICAL SECTION .

⊕ DENOTES HORIZONTAL & VERTICAL GRID LINES . GRID IS 1'0" x 6 3/4" (Centre To Centre Of 1/4" Joints)



SCALE:  
1/2" = 12"

SERVICE SHEET NO 7155

• CERAMIC GLAZED  
STRUCTURAL BLOCK • MODULAR SET OUT

WUNDERLICH LIMITED .

TRADE



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# Wunderlich

## CERAMIC GLAZED STRUCTURAL BLOCKS

A WALL AND CERAMIC FINISH IN ONE

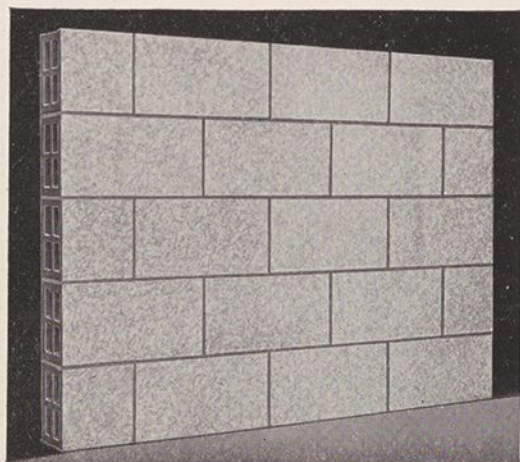
### MODULAR SET OUT:

Ceramic Glazed Structural Blocks are MODULAR in size thus facilitating designing and preparation of quantities. Adherence to the MODULAR SET OUT on the previous page and VERTICAL COURSE HEIGHT TABULATION shown hereunder, will obviate cutting on the job, reduce material and labour costs, and result in faultless appearance.

### VERTICAL COURSE HEIGHTS TABULATION

Course Heights	Glazed Structural Block Units	Course Heights	Glazed Structural Block Units
6 $\frac{3}{4}$ "	1	11' 9 $\frac{3}{4}$ "	21
1' 1 $\frac{1}{2}$ "	2	12' 4 $\frac{1}{2}$ "	22
1' 8 $\frac{1}{4}$ "	3	12' 11 $\frac{1}{4}$ "	23
2' 3"	4	13' 6"	24
2' 9 $\frac{3}{4}$ "	5	14' 0 $\frac{3}{4}$ "	25
3' 4 $\frac{1}{2}$ "	6	14' 7 $\frac{1}{2}$ "	26
3' 11 $\frac{1}{4}$ "	7	15' 2 $\frac{1}{4}$ "	27
4' 6"	8	15' 9"	28
5' 0 $\frac{3}{4}$ "	9	16' 3 $\frac{3}{4}$ "	29
5' 7 $\frac{1}{2}$ "	10	16' 10 $\frac{1}{2}$ "	30
6' 2 $\frac{1}{4}$ "	11	17' 5 $\frac{1}{4}$ "	31
6' 9"	12	18' 0"	32
7' 3 $\frac{3}{4}$ "	13	18' 6 $\frac{3}{4}$ "	33
7' 10 $\frac{1}{2}$ "	14	19' 1 $\frac{1}{2}$ "	34
8' 5 $\frac{1}{4}$ "	15	19' 8 $\frac{1}{4}$ "	35
9' 0"	16	20' 3"	36
9' 6 $\frac{3}{4}$ "	17	20' 9 $\frac{3}{4}$ "	37
10' 1 $\frac{1}{2}$ "	18	21' 4 $\frac{1}{2}$ "	38
10' 8 $\frac{1}{4}$ "	19	21' 11 $\frac{1}{4}$ "	39
11' 3"	20	22' 6"	40

**NOTE:** The height of a Ceramic Glazed Structural Block, viz., 6 $\frac{3}{4}$ ", is equivalent, when laid, to two courses of 3" brickwork.



SECTION OF  
A WALL OF  
CERAMIC  
GLAZED  
STRUCTURAL  
BLOCK.

### STRENGTH TESTS:

The following test sheet shows that Glazed Ceramic Structural Blocks are capable of withstanding higher compressive loads than are ordinary building bricks.

### DEPARTMENT OF PUBLIC WORKS

INVESTIGATION No. 28750 MISC. 52/9166.

REPORT ON GLAZED STRUCTURAL BLOCKS; WUNDERLICH LIMITED.

Nine (9) Glazed Structural Blocks were submitted for test by Wunderlich Limited, Grand Avenue, Granville.

Results obtained are as follows:—

#### COMPRESSIVE STRENGTH

Date when tested	Dimensions			Max. load tons	Compressive strength lbs. per sq. in. on gross area	Compressive strength P.S.I. net area (converted by Wunderlich Limited from gross area result)
	Lgth. ins.	Brdth. ins.	Depth ins.			
11/6/'52	12.0	4.8	6.6	76.5	2,975	7,120
"	12.0	4.8	6.6	70.5	2,742	6,580
"	12.0	4.8	6.6	72.5	2,819	6,760

#### TRANSVERSE STRENGTH

Date when tested	Dimensions			Max. load tons	Modulus of Rupture lbs./sq. in.	Distance between bearers (ins.)
	Lgth. ins.	Brdth. ins.	Depth ins.			
11/6/'52	12.0	4.8	6.6	7.10	1,140	10.0
"	12.0	4.8	6.6	6.30	1,012	10.0
"	12.0	4.8	6.6	6.45	1,035	10.0

#### ABSORPTION

Dry weight lbs.	After 24 hours immersion lbs.	Absorption %
14.640	15.698	7.2
14.935	16.219	8.6
14.836	16.040	8.1

(Signed)

CHIEF TESTING OFFICER, 13/6/'52.

**OPINION:** An authoritative opinion confirms the suitability of Ceramic Glazed Structural Block for the purposes recommended.

### DEPARTMENT OF WORKS

### COMMONWEALTH EXPERIMENTAL BUILDING STATION

DELHI ROAD, NORTH RYDE

BS.50/70

30th June, 1952.

Wunderlich Ltd., Parramatta

Dear Sirs,

The results of tests indicated in the Department of Works' Report No. 28750 accompanying your communication of 20th June are indicative of a very high-quality product.

There is no doubt, whatever, as to the suitability of the blocks for the construction of load-bearing walls in two-storey constructions having a concrete slab floor at first-floor level.

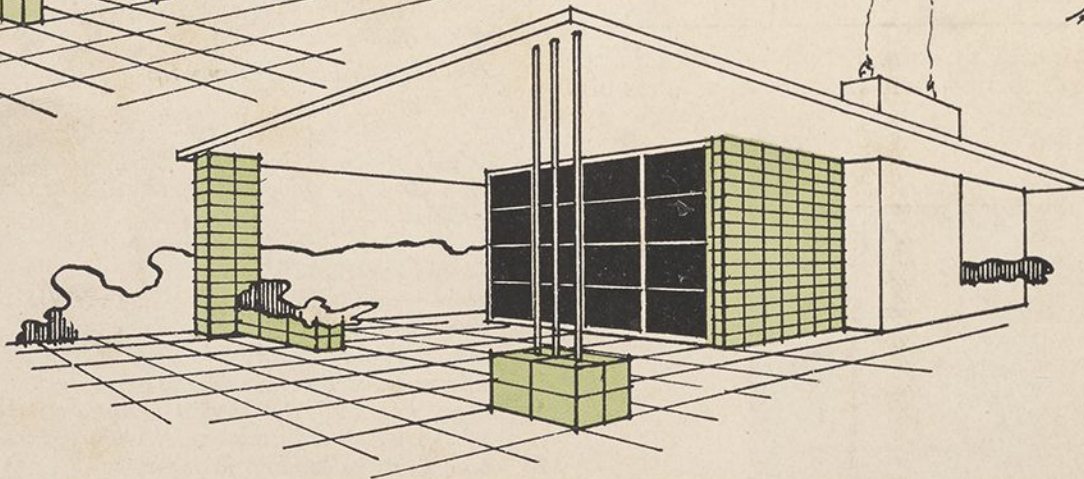
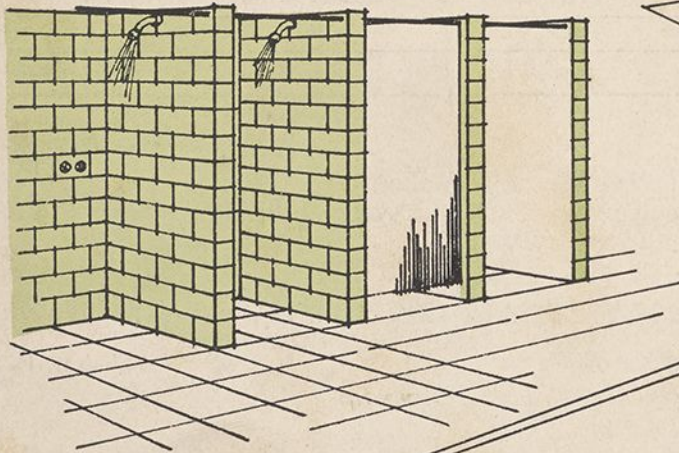
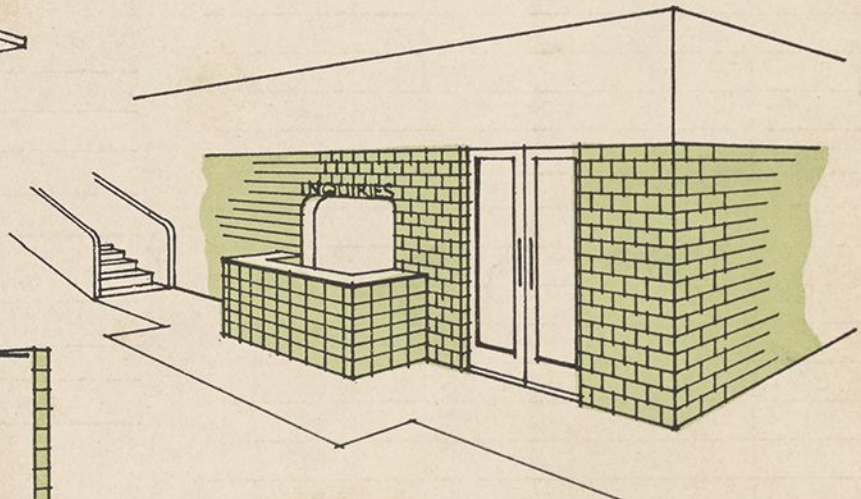
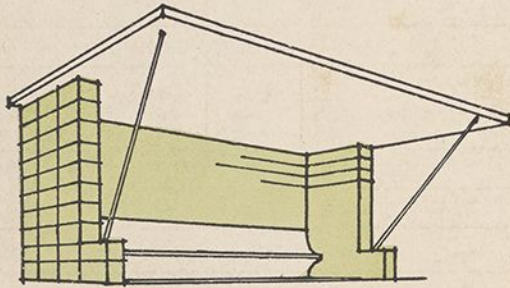
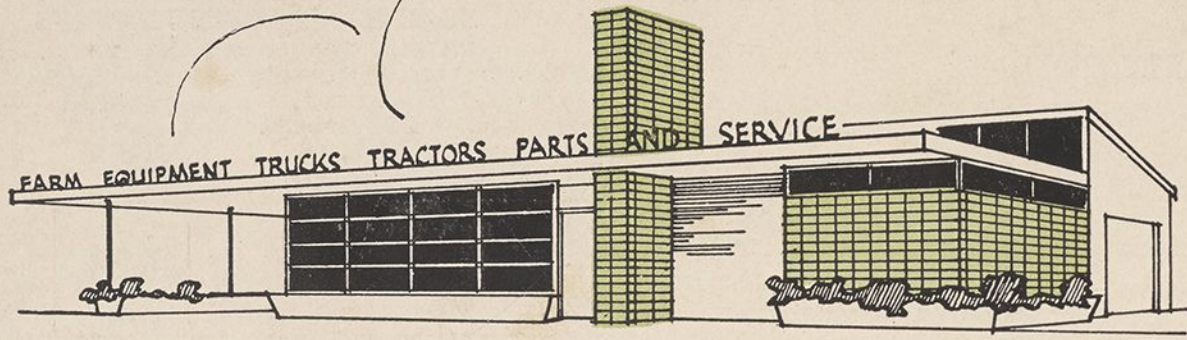
The Public Works Department's testing officer has informed us that the blocks were tested on their bedding area, i.e., that the mortar was spread level with the top of the upstanding nibs on the blocks; thus the blocks were subjected to loading in the same manner as they would be in construction.

The possibility of mortar shrinkage causing the blocks to be loaded on their upstanding nibs is considered remote but, in any case, such an eventuality would have no structural significance in this instance.

Yours faithfully,

DAVID V. ISAACS, DIRECTOR.





SERVICE SHEET NO 7151

SUGGESTIONS FOR USE OF CERAMIC  
GLAZED STRUCTURAL BLOCKS.

WUNDERLICH LIMITED

TRADE



MARK.