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The Architects' JOURNAL for October 14, 1954

ARC HIT



standard

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every issue does not necessarily contain all these contents but they are the regular features which continually recur

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* A glossary of abbreviations of Government Departments and Societies and Committees of all kinds, together with their full address and telephone numbers. The glossary is published in two parts—A to le one week, Ig to Z the next. In all cases where the town is not mentioned the word LONDON is implicit in the address.

	•
AA AAI	Architectural Association, 34/6, Bedford Square, W.C.1. Museum 0974 Association of Art Institutions. Secy.: W. Marlborough Whitehead, "Dyneley,"
ABS ABT ACGB ADA ArchSA ARCUK BAE BATC	Castle Hill Avenue, Berkhampstead, Herts. Architects' Benevolent Society. 66, Portland Place, W.1 Association of Building Technicians. 5, Ashley Place, S.W.1. Arts Council of Great Britain. 4, St. James' Square, S.W.1. Aluminium Development Association. 33, Grosvenor Street, W.1. Architectural Students' Association. 34/36, Bedford Square, W.C.1. Architects' Registration Council. 68, Portland Place, W.1 Board of Architectural Education. 66, Portland Place, W.1 Building Apprenticeship and Training Council. Lambeth Bridge House, S.E.1. Reliance 7611, Ext. 1706
BC BCC BCCF BCIRA BDA BEDA BIA	Building Centre. 26, Store Street, Tottenham Court Road, W.C.1. British Colour Council. 13, Portman Square, W.1. British Cast Concrete Federation. 105, Uxbridge Road, Ealing, W.5. British Cast Iron Research Association. Alvechurch, Birmingham. Redditch 716 British Door Association. 10, The Boltons, S.W.10. British Electrical Development Association. 2, Savoy Hill, W.C.2. Temple Bar 9434 British Ironfounders' Association. 145, Vincent Street, Glasgow, C.2. Glasgow Central 2891
BIAE BID BINC BOT	British Institute of Adult Education. 29, Tavistock Square, W.C.1. Euston 5385 Building Industries Distributors. 52, High Holborn, W.C.1. Chancery 7772 Building Industries National Council. 11, Weymouth Street, W.1. Langhám 2785 Board of Trade. Whitehall Gardens, Horseguards Avenue, Whitehall, S.W.1. Trafalgar 8855
BRDB	British Rubber Development Board. Market Buildings, Mark Lane, E.C.3. Mansion House 9383
BRS BSA BSI BTE CABAS	Building Research Station. Bucknalls Lane, Watford. Building Societies Association. 14, Park Street, W.1. British Standards Institution. British Standards House, 2, Park St., W.1. Mayfair 9000 Building Trades Exhibition. 4, Vernon Place, W.C.1. City and Borough Architects Society. C/o Johnson Blackett. F.R.I.B.A
CAS	Civic Centre, Newport, Mon. Newport 5491 County Architects' Society. C/o F. R. Steele, F.R.I.B.A., County Hall, Chichester. Chichester 3001
CCA CCP CDA CIAM COID CPRE CUC CVE DGW	County Hall, Chichester. Chichester 3001 County Hall, Chichester. Chichester 3001 Council for Codes of Practice. Lambeth Bridge House, S.E.1. Copper Development Association. Kendals Hall, Radlett, Herts. Congrès Internationaux d'Architecture Moderne. Doldertal, 7, Zurich, Switzerland. Council of Industrial Design. Tilbury House, Petty France, S.W.1. Council for the Preservation of Rural England. 4, Hobart Place, S.W. Sloane 4280 Coal Utilization Council. 3, Upper Belgrave Street, S.W.1. Council for Visual Education. 13, Suffolk Street, Haymarket, S.W.1. Reading 72255 Directorate General of Works, Ministry of Works, Lambeth Bridge House, S.E.1. Reliance 7611
DIA DPT	Design and Industries Association. 13, Suffolk Street, S.W.1. Whitehall 0540 Department of Overseas Trade. Horseguards Avenue, Whitehall, S.W.1.
ЕЈМА	Trafalgar 8855 English Joinery Manufacturers' Association (Incorporated), Sackville House, 40, Piccadilly, W.1. Regent 4448
EPNS FAS FASS	English Place-Name Society. 7, Selwyn Gardens, Cambridge. Faculty of Architects and Surveyors. 67, Oxford Street, W.1. Federation of Association of Specialists and Sub-Contractors, Gerrard 0021
FBBDO	Artillery House, Artillery Row, S.W.1. Abbey 7232 Fibre Building Board Development Organisation, Ltd., Melbourne House, Aldwych, W.C.2. Temple Bar 4561
FBI FC FCMI FDMA FLD	Federation of British Industries. 21, Tothill Street, S.W.1. Whitehall 6711 Forestry Commission. 25, Savile Row, W.1. Federation of Coated Macadam Industries. 37, Chester Square, S.W.1. Sloane 1002 The Flush Door Manufacturers Association Ltd. Trowell, Nottingham. Ilkeston 623 Friends of the Lake District. Pennington House, nr. Ulverston, Lancs.
FMB	Federation of Master Builders. 26, Great Ormond Street, Holborn, W.C. Chancery 7583
FPC FRHB	The Federation of Painting Contractors, St. Stephen's House, S.W.1. Whitehall 3902 Federation of Registered House Builders. 82, New Cavendish Street, W.1.

Faculty of Surveyors of England. 67, Oxford Street, W.1. Gas Council. 1, Grosvenor Place, S.W.1. Georgian Group. 27, Grosvenor Place, S.W.1. Housing Centre. 13, Suffolk Street, Pall Mall, S.W.1.

Institution of Civil Engineers. Great George Street, S.W.1.
Institution of Electrical Engineers. Savoy Place, W.C.2.
Illuminating Engineering Society. 32, Victoria Street, S.W.1.

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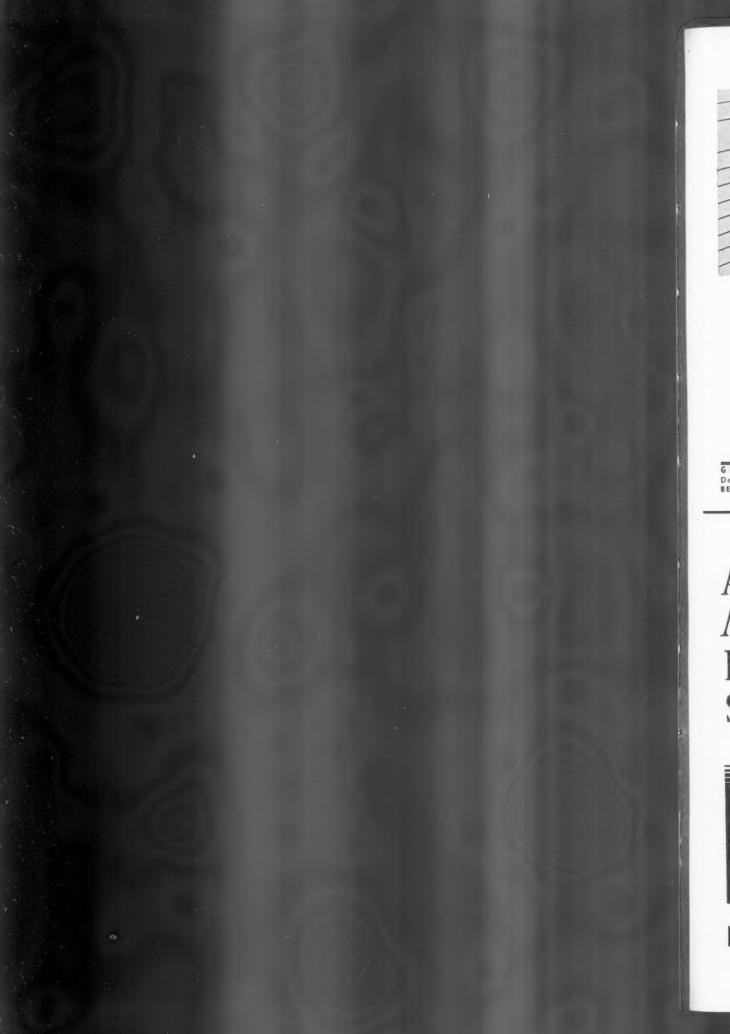
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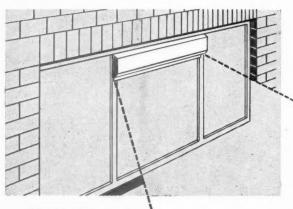
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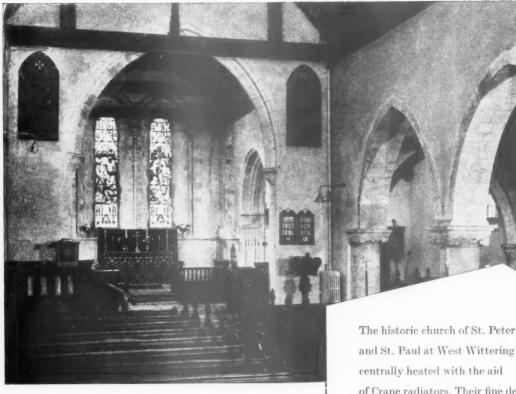
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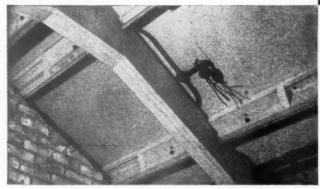
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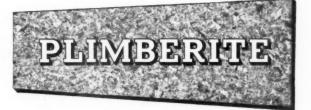




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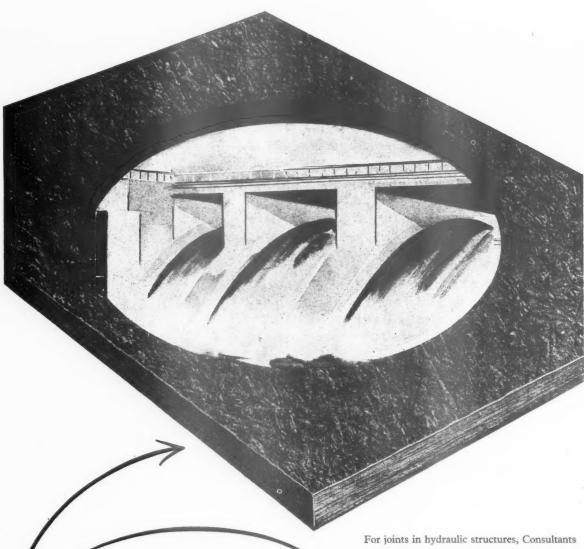
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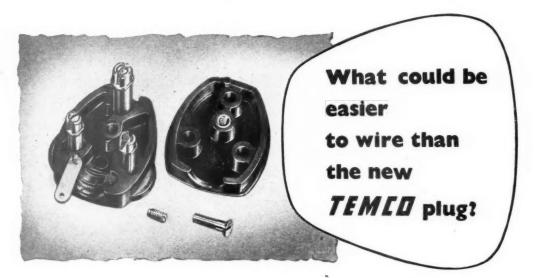
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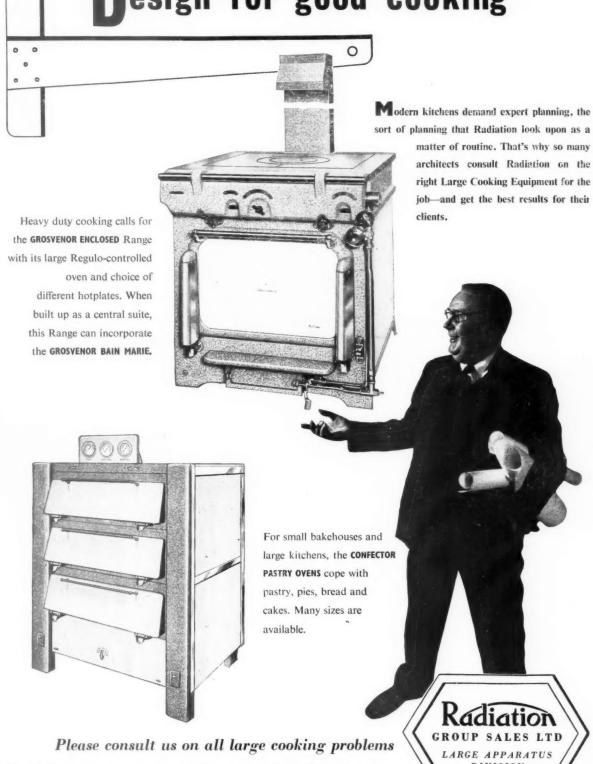
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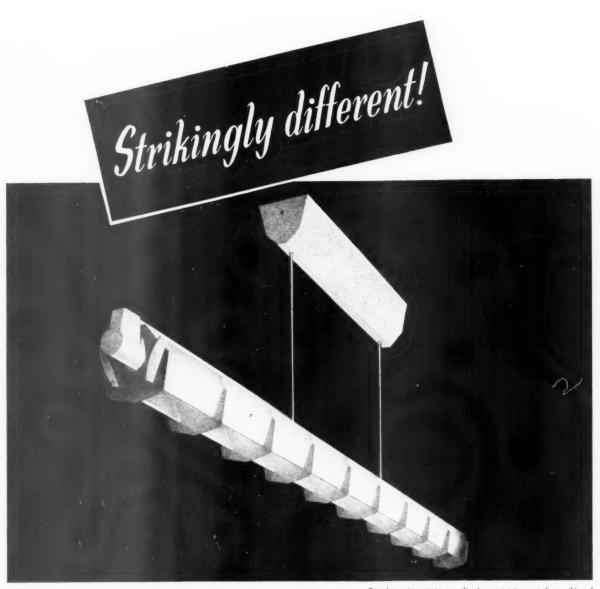


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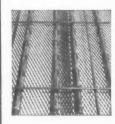
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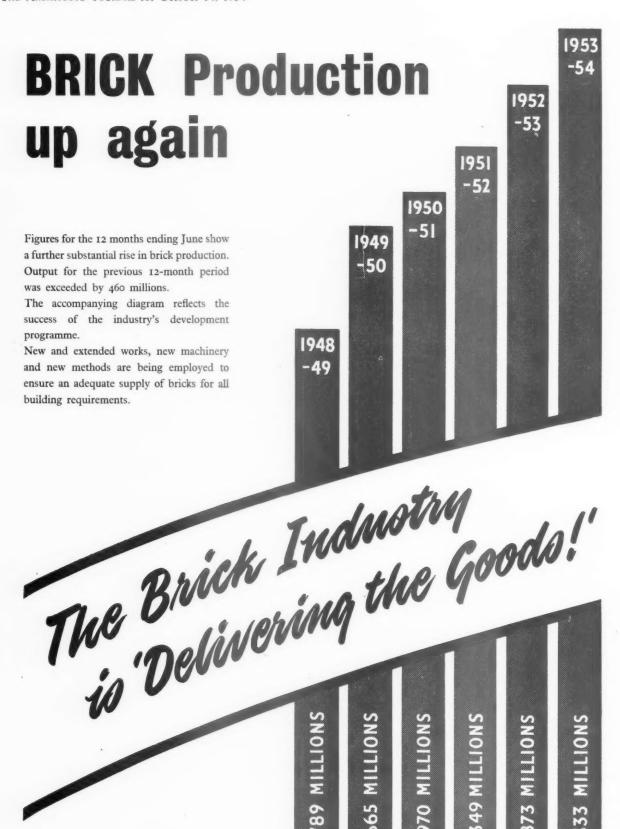
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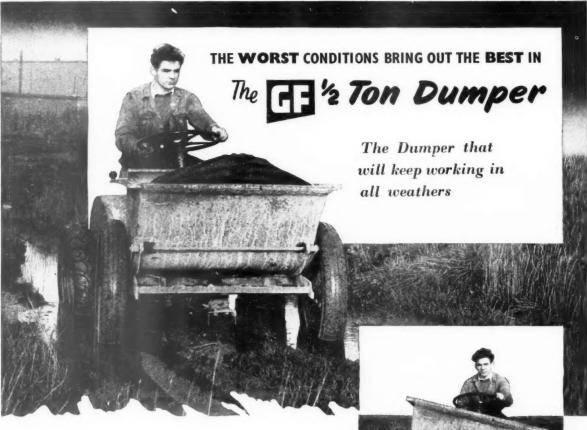
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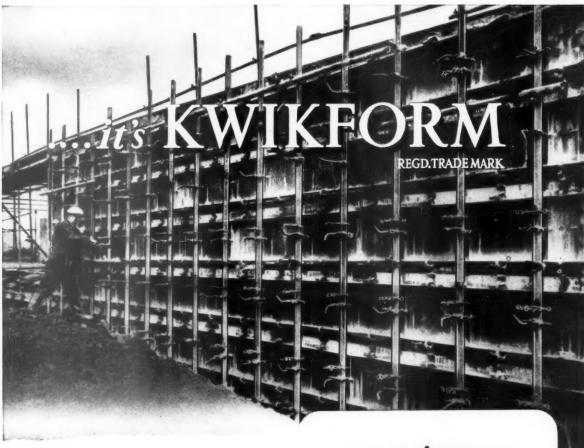
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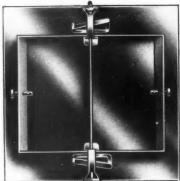
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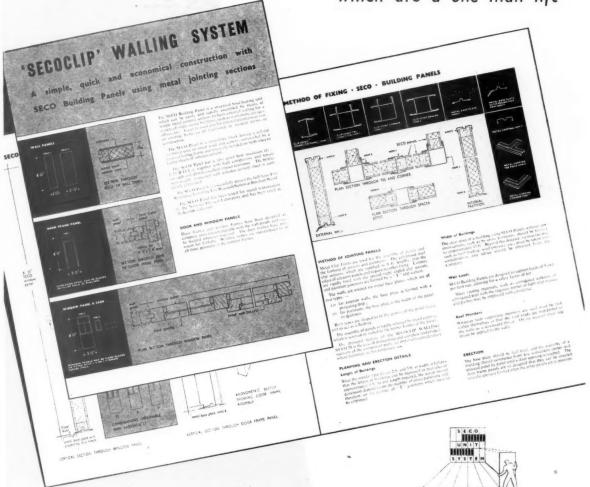
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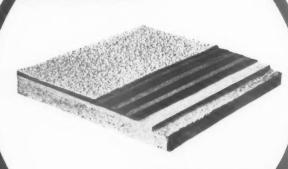
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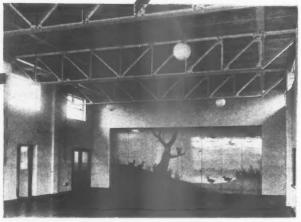
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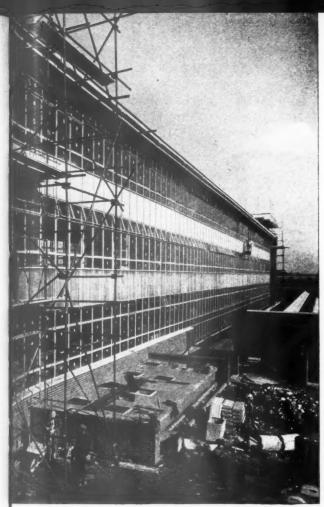
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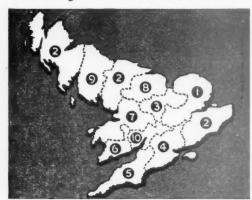
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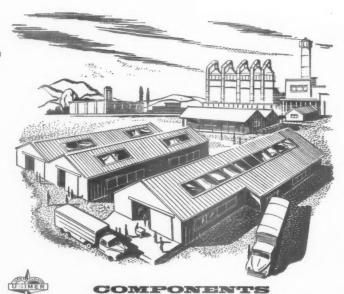
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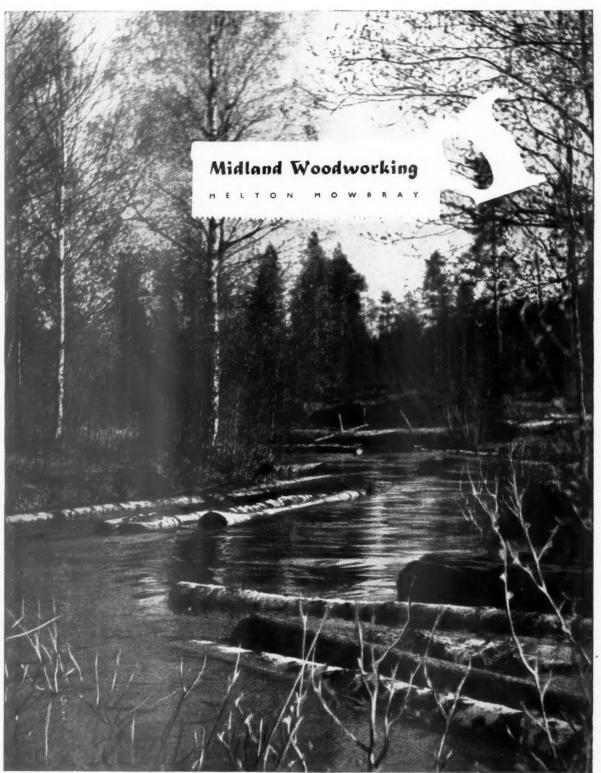
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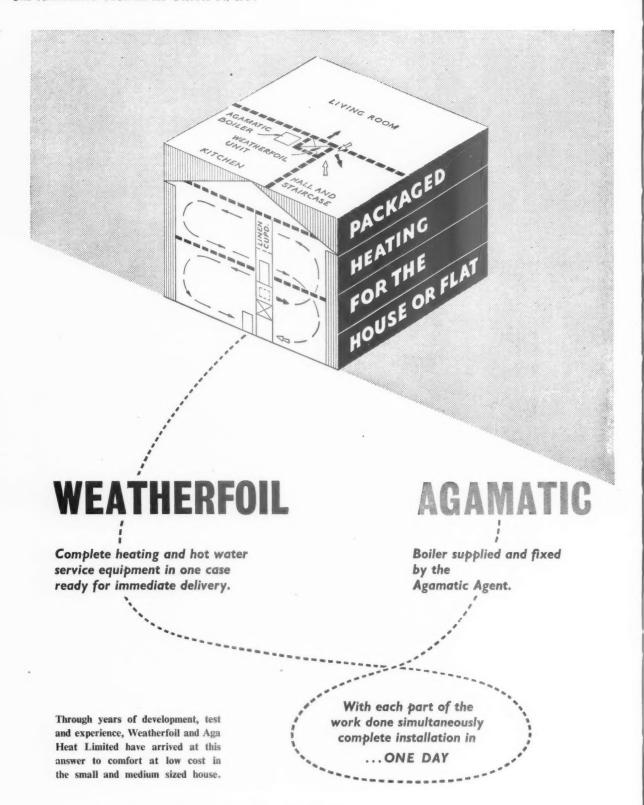
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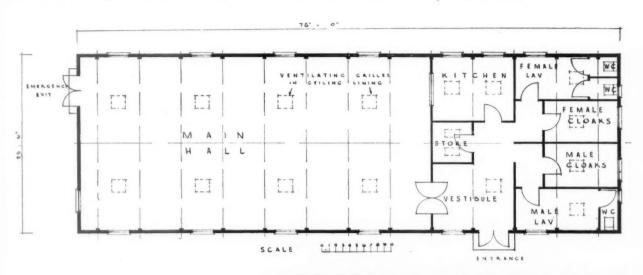
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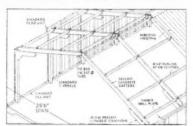
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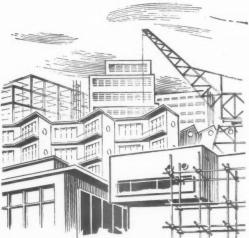
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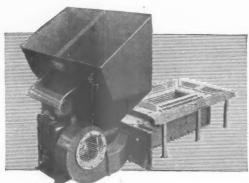


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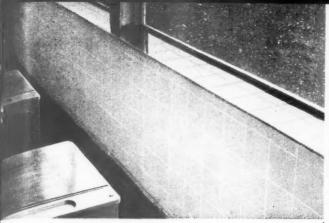


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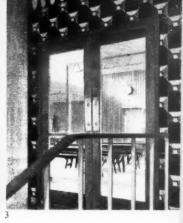
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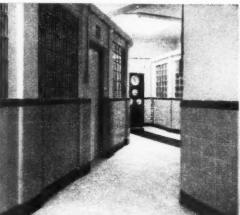






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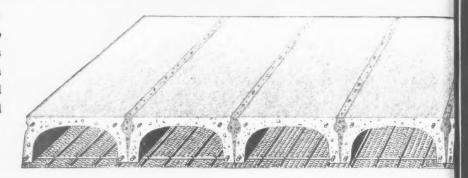
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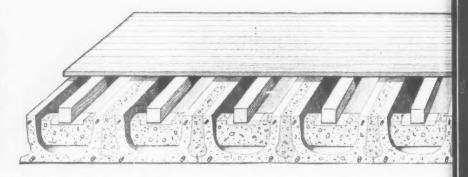
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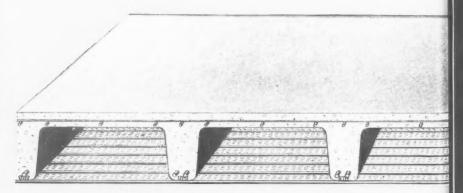
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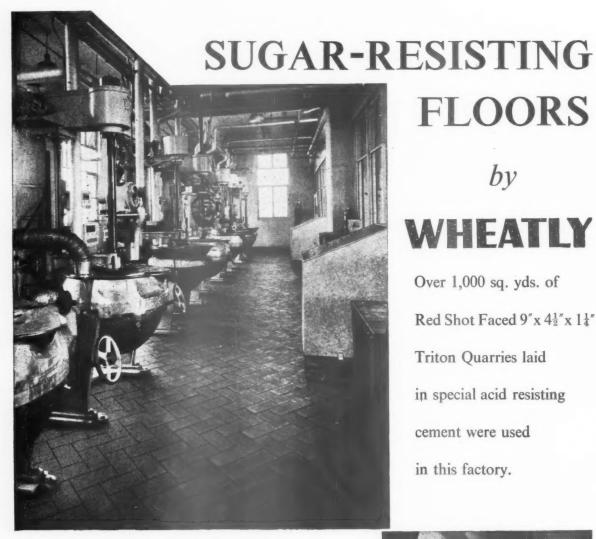
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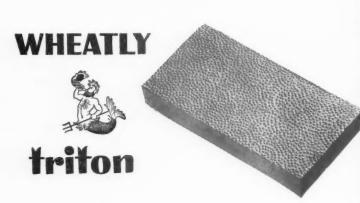


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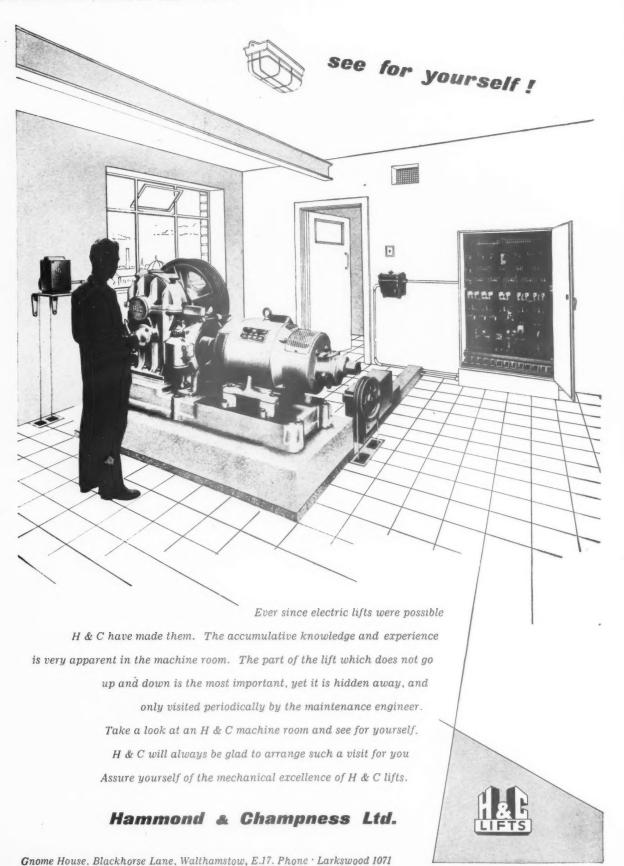
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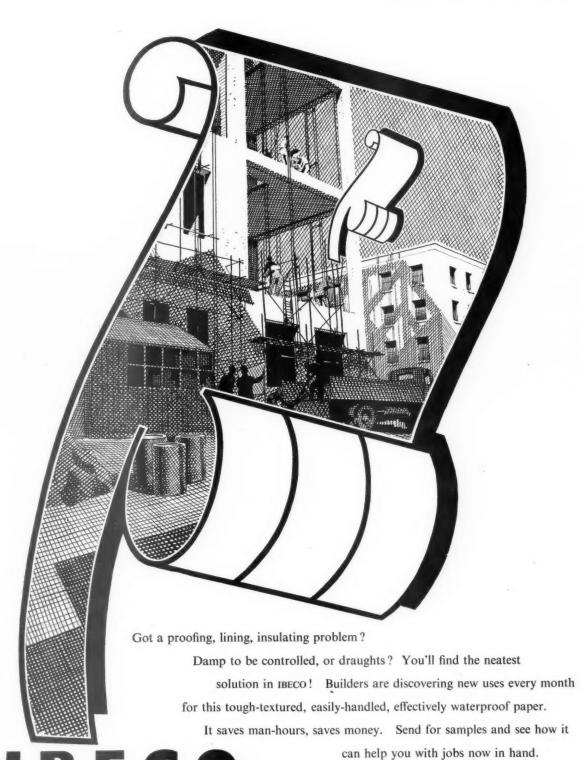
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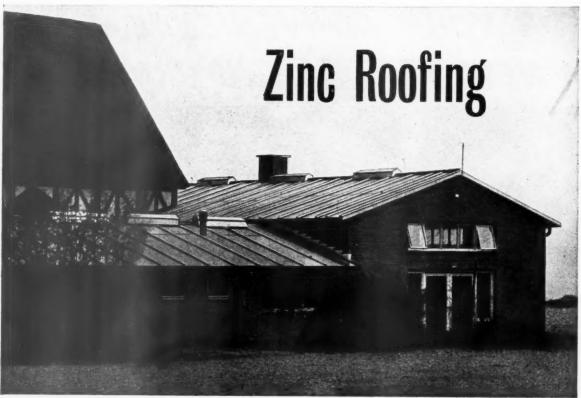
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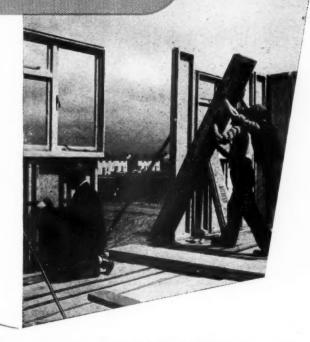
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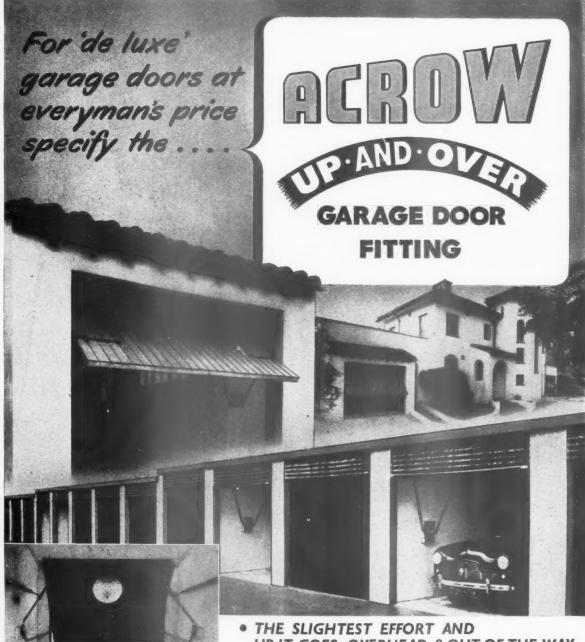
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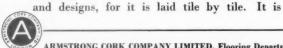
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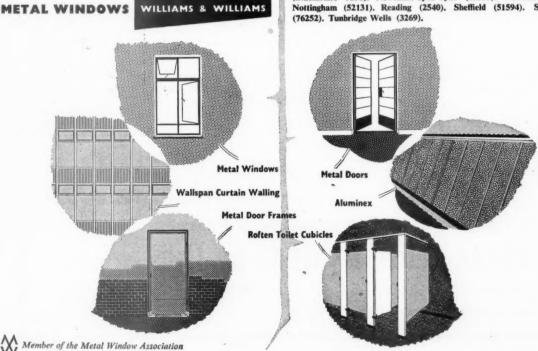
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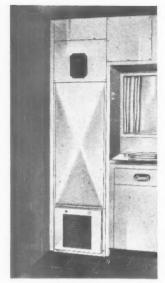
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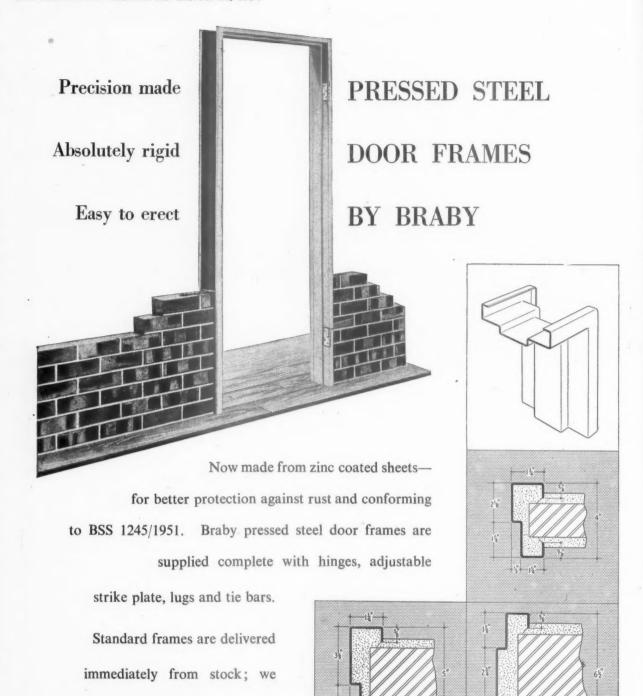


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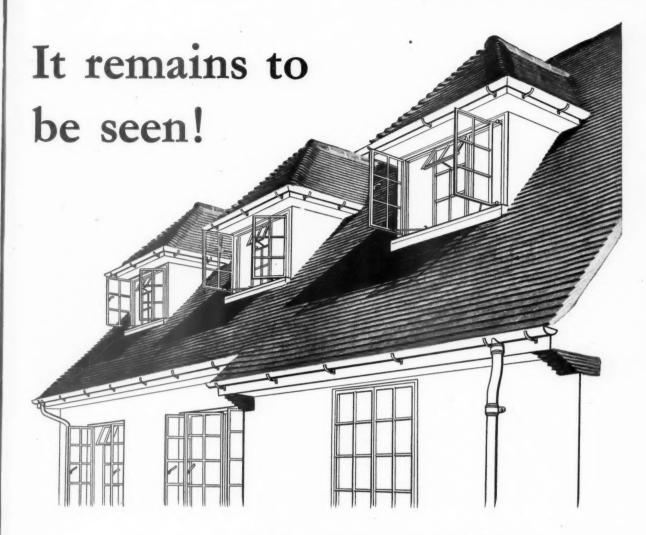
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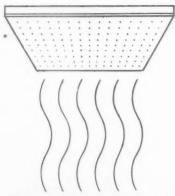


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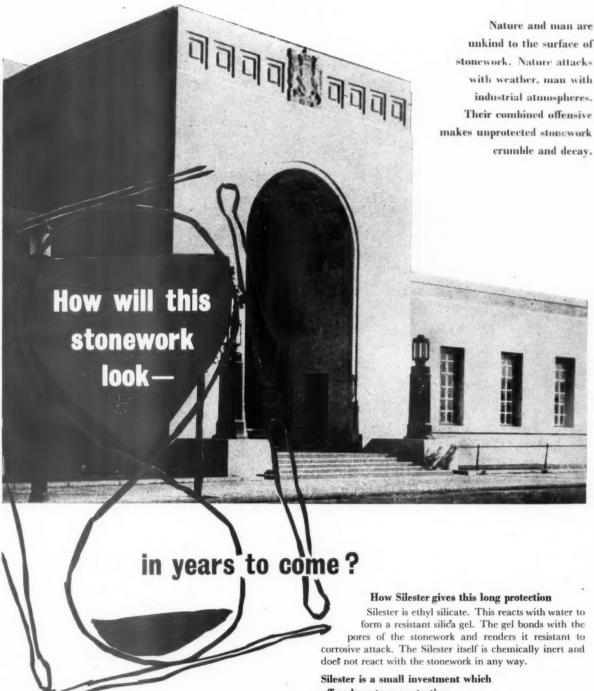


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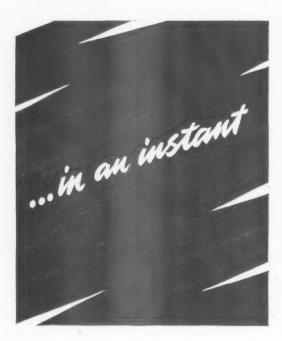
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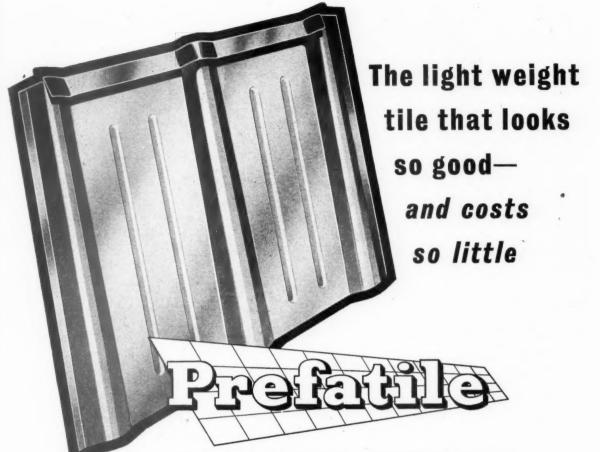
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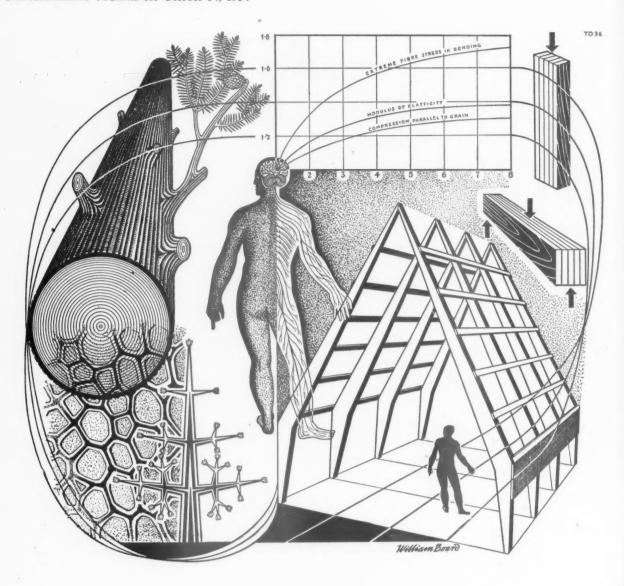
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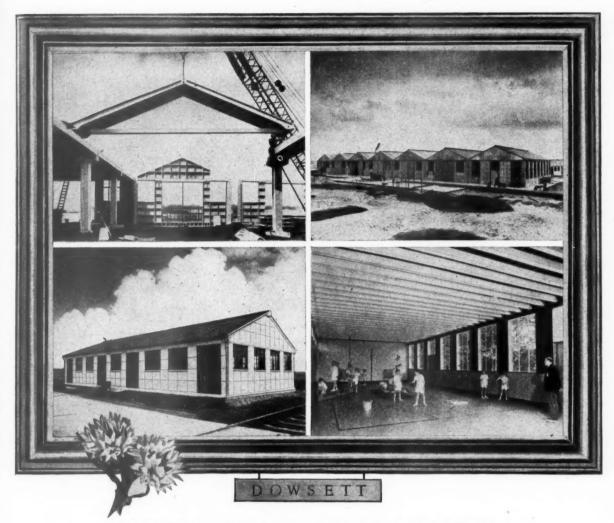
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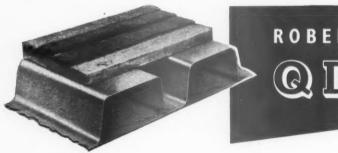
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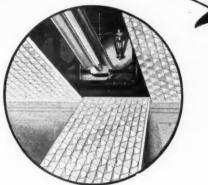
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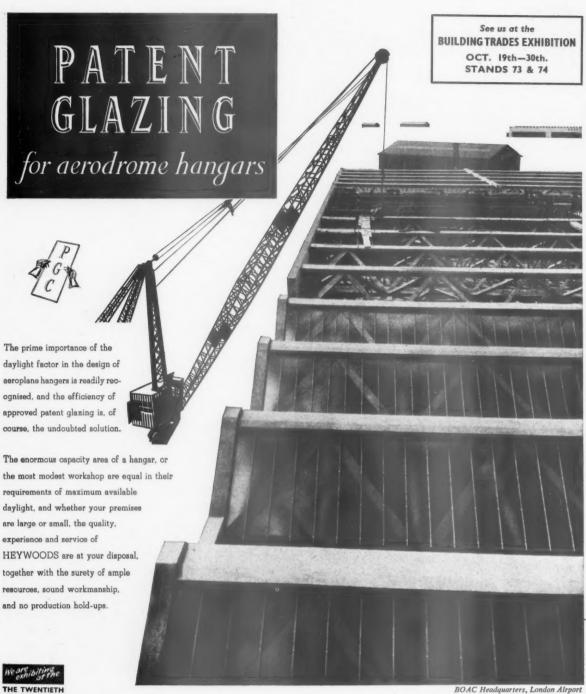
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SPECTACLES WITHOUT GLASSES

"You don't need glasses," said the cinema poster. And ASTRAGAL, who had never said you did, removed his, walked slap into a commissionaire and -after recoiling politely-groped his way into the London Casino. He had already been well primed about this thing called Cinerama by the better newspaper critics, and was feeling competent to dismiss it with a tolerant smile, even before it had burst upon him. "As a film," he would probably write, "Cinerama is no better than 'Nanook of the North.'" It is not so much a significant innovation in the history of the cinema as a symptom of the malaise of our time"

Two hours later your columnist staggered out into Old Compton Street, effortlessly looked both ways at once, and strode off-marvelling-in pretty well all directions. Or so it seemed after a fifteen-bob reminder that the eye can see more than it is looking at, which is, of course, the whole point of Cinerama. The point is well taken, as far as one critic is concerned. When Fred Waller decided that "the secret of creating the illusion of natural perspective on film is largely a matter of reproducing the actual range of human vision," he hit on something far more startling than the 3-D film which has to be seen through special glasses. Watching 3-D in the cinema is rather like looking at something happening through a window: the realism begins beyond the frame of the screen. But watching scenery or action on a Cinerama screen is the nearest thing to actually being on the spot when the film is taken. Once you have forgotten the gaps below and above the screen the illusion is excellent, especially in shots which surround you with buildings. Particularly good are the scenes in Venice (after being dumped down in St. Mark's Square, you are taken on an incredibly realistic trip up the canals) and in a small Spanish village square. There is no doubt that Cinerama can give the spectator more of a feeling for the atmosphere of a place than he could get from any amount of still photographs or "flat" travel films.

Incidentally, an architect, Ralph Walker, had a hand in the devising of the Cinerama technique. It was when Mr. Walker asked for Fred Waller's help in showing a film in the Perisphere—a building at the New York World's Fair

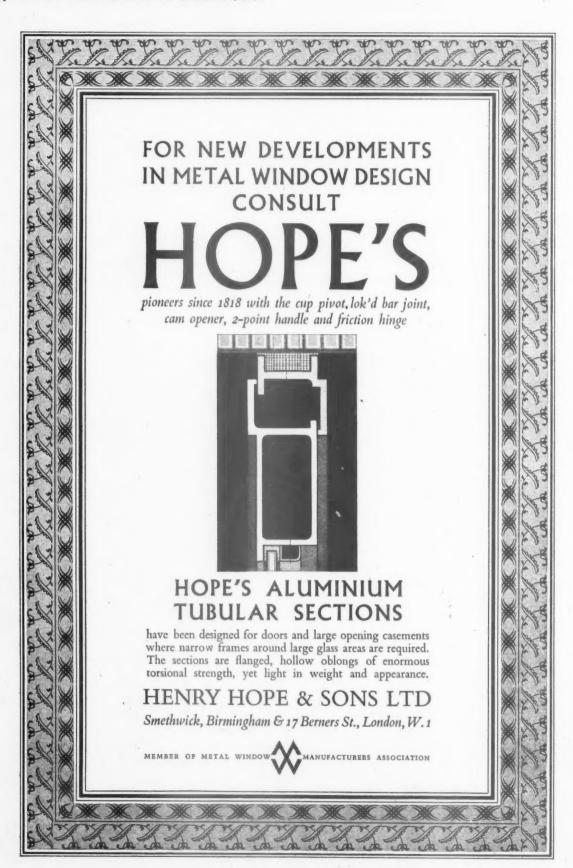
—that Fred Waller first thought of using a curved screen in his Cinerama experiments. And mention of the World's Fair puts the thought in my mind that this remarkable wide-screen technique could be used most valuably for recording such events as the South Bank exhibition — or, indeed, any great occasions that are worthy of being shared by future generations.

Postscript: the Cinerama poster needs an amendment. It should read: "You don't need glasses, but you do need earplugs." It is very clever of sterophonic sound to come at the spectator from all directions; but need it come quite so close?

ARCHITECTURAL AIRING

It is not often that the BBC gives airspace at all to architecture these days, so it was quite an event to have Peter Shepheard and J. M. Richards holding forth on the same evening, if not the same programme, last week. In the series on the artist's responsibility to the public, Peter Shepheard, president of the AA, discussed the architect and the difficulties of his relationship to his almost non-existent voluntary public (people interested in architecture) and to his unlimited captive public (people who have to use buildings). Though it was perhaps gratuitous to drag a minor current battle of the styles into the discussion, this was the only blemish on an otherwise exemplary and common-sense exposition of the architect's working conditions and his relations with different kinds of clients, couched in terms which the Home service public could appreciate.

J. M. Richards, in the more rarefied



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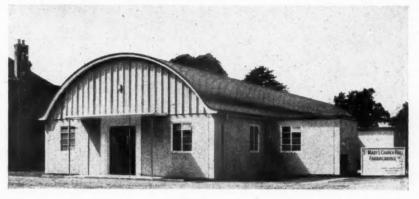
atmosphere of the Third, talked about the undignified brawling which has attended the Cambridge development plan, the battle between rival authorities and the jealous defence of individual privileges by individual colleges. It is depressing to find such small-town small-mindedness in a place which has contrived to accumulate a rare collection of architectural masterpieces, and whose college quads have set a standard in humane townplanning. One hopes that Richards's appeal for a broader and more generous attitude on the part of all concerned will take effect before the time-honoured Gower Street gibes at the "provincial universities" begin to come true.

THE TRIENNALE

Two reports on the Triennale which have been publicly delivered-by Misha Black to the DIA and by Reyner Banham to the ICA-provide some basis for summing up and evaluating the lessons of this year's exhibition. In spite of a difference of approach— Mr. Black laying emphasis on furniture and fittings, Mr. Banham on architectural and engineering constructionsboth admitted a slight tinge of disappointment, and felt that the Triennale was not quite what it had been. Both of them thought that the Italians had let the side down, while the international participation was as lively as ever, and both agreed that because of this-or in spite of it-the absence of an official British exhibit was to be deplored, and that something must be done before 1957 to see that we are not absent next time.

A semi-official spokesman, whose name ASTRAGAL of course may not quote, said that the lack of official interest was due to a lack of external pressure on the powers-that-be. He believed that if someone had explained forcibly and frequently that the Triennale was an exhibition not only of local Milanese interest, but also of world-wide prestige value (even if the immediate cash return was slight), then official interest might have been forthcoming.

While the buck is passing to and fro, all who are in any way concerned in this matter should reflect that it is *only* three years to the next Triennale, and that action should be taken now. There is talk of the formation of a per-



Reema Construction, Ltd., have deservedly made a name for themselves with their partially prefabricated concrete houses: They have now produced a design for a village hall, in the words of their Press handout "under the sponsorship of the DSIR." Designed by L. Magnus Austin, it seats 200, has a stage, projection room, two dressing rooms, cloakrooms for men and women, a kitchen and a store. The walls are of precast concrete. The roof is of laminated wood ribs, boarded and covered with built-up bituminous-felt tiles. Astragal comments: "It will be interesting to learn if the dominating curved roof will fit happily into the village scene, or whether this prefabricated system of builders will be sufficiently flexible to allow for different arrangements to suit different site conditions.

manent British Triennale committee, to ginger along both HM government and the trade side. ASTRAGAL favours this plot, and wishes power to its united elbow.

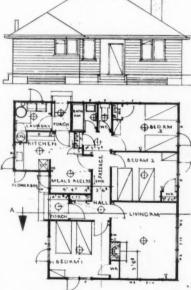
RESTORATION GRANTS

The MOW's list of grants to Historic Buildings* makes very encouraging reading. "Good causes" of a domestic nature take up most of the list, and most of these buildings are the sort that need preserving more for their architectural quality than for their place in the public's great warm heart. Thus, the Minister's strong right arm comes—at last—to the aid of Wrencote, Croydon. (It will get a grant, of unstated size, for structural repairs and making-good).

What speaks wonders for the quality of the Minister's advisers is the making of grants to three groups of garden architecture (or four if you include the Inigo Jones pavilions at Stoke Bruerne). There are the Look-out and Rotunda at Croome Court; the sham Castle (a pioneering piece of Gothic Ruination), Rotunda, Obelisk and Doric Temple (a pioneer piece of Athenian Stuart) at Hagley; and a plethora of minor masterpieces in the gardens at Stowe, including Gibbs's Boycott pavilions, and two of Kent's prettier temples.

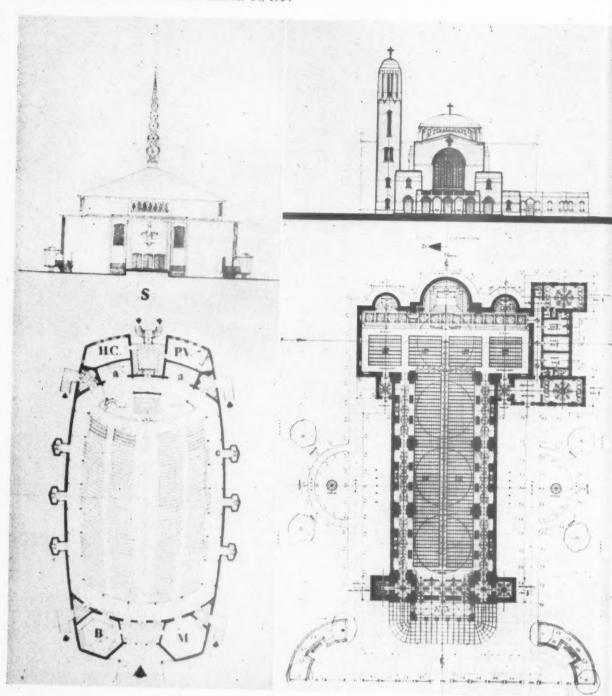
Other triumphs for the Georgian Group include a grant toward repairs at Holkham—of which all East Anglians and Palladians will approve; for certain pieces of spa-architecture, including

Advances Corporation is not, we presume,



ASTRAGAL'S suspicions were aroused when he read, in the JOURNAL of September 23, the announcement of the New Zealand house construction competition. This stated that the New Zealand Government's objective was "to seek ideas for methods of construction and the use of materials which could be applied to a standard house plan." The principal of "here's a design, construct it" is, of course, wrong on every ground. Construction and design, as every every second-year student over here has learnt, goes hand in hand with erection techniques and cost. And, incidentally, what an odd, old-fashioned plan. Judging from the high standards set by the New Zealand architects in London this little effort on the part of the N.Z. Ministry of Housing, the N.Z. Institute of Architects, and the architects of the N.Z. State

^{*} See page 468.



Tradition Triumphant

The most tricky kind of architectural competition is a competition for designs of a church. If the entrant is a sincere architect but an atheist, he may produce something which is mere exhibition hocus-pocus. If, on the other hand, he is as sincere a believer as he is a sincere architect, then he may produce a traditional design which is quite horrible—simply because he believes the church cannot afford to lose touch with its associations with the past. It is all very complicated; and it becomes more complicated when a sponsor rejects a prize-winning contemporary design and decides to build a baroque also-ran. That is what has happened in Ireland. T. J. Ryan's winning design (above left) in a

competition for a Catholic Church at Clonskeagh has been rejected by the sponsors in favour of the one above right, by Jones and Kelly, which the assessors, G. McNicholl, N. Montgomery, and F. Gibney, did not even commend. No doubt Jones and Kelly produced their design without tongues in cheeks. Nevertheless, this tale does seem to point an unfortunate moral. It warns the intending competitor to take a careful look at both the assessor and the sponsor and then, having worked out which is the larger sum—the prize money or 6 per cent. of the estimated cost of building—to decide whether to design for the sponsor or for the judge.

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Pittville Pump Room, Cheltenham; for one of the decayed sections of Royal Crescent, Bath, and for the fallen pediment of 77 Pulteney Street, Bath, which was recently the subject of a ludicrous public enquiry. (It is not, incidentally, the only pediment in Pulteney Street which needs to be reconstituted). The list also includes a recommendation for an onslaught on the death-watch beetles at Chirk, which is one of ASTRAGAL'S favourite castles. Congratulations to the Minister and the Historic Buildings Councils

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Whatever reservations some suspicious citizens may have about the way the Tate gallery serves the public, he must admit that it has given us a remarkable series of exhibitions in recent months, and whether one regards the very comprehensive exhibition of Cezanne's paintings, which opened recently, as the end of the summer season or the opening of the winter one, it is certainly a magnificent send-off.

We know Cezanne only too well in reproductions and, apart from a few old faithfuls in public collections, far too little in the original. Those who complain that photography travesties architecture should see what it does to paintings—even the reproductions in the excellent catalogue will come as a surprise if one compares them with the originals. So these sixty-five pictures are a heaven-sent opportunity to see the master of Aix in the original oil and canvas, and nobody who believes that architecture has anything to do with the visual arts can afford to miss it.

ASTRAGAL, snooping around in a false beard at the opening of the exhibition (in the hope of being mistaken for Augustus John), was therefore delighted to observe that at least two very distinguished architects were present and, unlike the rest of the company-who were looking at one another-were actually looking at the pictures. Less distinguished architects please copyand if in any doubt about what is supposed to be good about Cezanne, please read the very full and informative introduction which Professor Gowing, who selected and collected the paintings, has written for the catalogue.

ASTRAGAL

POINTS FROM THIS ISSUE

MOW's new grants for historic buildings	pages	453 and 468
Clonskeagh Catholic Church: competition designs il	lustrated	
	pages	454 and 469
The New Barbican: described and illustrated		page 457

A postcript to the Journal's issue on Architectural Ironmongery page 475

The Editors

REBUILDING THE CITY

AST week Astragal commented on the suggestion, made by the Lord Mayor of London, that city building sites should be floodlit on the night of his banquet. This suggestion, as the LMBA has so charmingly put it, now "bears fruit." On the night of November 9 powerful lamps will beam on the skeletons of London's future buildings, so that visitors to the banquet may know that after only nine years of peace we are rebuilding our capital city.

The less enlightened visitors will probably assume that in these nine years planners have devised a comprehensive plan for city rebuilding—a plan that will have something of the quality of the LCC's proposed development for the South Bank Exhibition site. And if they have heard the Minister of Works, Sir David Eccles, speaking in his most officially optimistic mood, they will have every reason to expect good things in the city. "You do feel," the Minister said last week, "that there is an urge to make the new city a fine one . . . It will be a most inspiring sight . . . There will be some taller buildings, and personally I do not mind a few fingers pointing into the sky: I shall be pleased to see a varied skyline in London."

A varied skyline? Surely Sir David knows that the City Corporation is imposing restrictions on architects which prevent them from introducing variety into their schemes.* At his least official he does, in fact, know this, and he startled his Ministry's Press representative, during his tour of inspection of city sites last week, by speaking very frankly in answer to a question. He had arrived on the scene too late, he said, to have any influence on the outside appearance of buildings. The buildings that were going up were not the fault of the architects concerned, for "they have to work within these awful regulations of the planning Ministry—and also the Corporation." The Press was asked—but not by the Minister—to suppress that remark. We are delighted to print it, for we are happy that so influential a person as Sir David Eccles is incensed enough about our capital city's fate to break rashly away from the smooth jargon of his profession. We hope that he, and any other bold and far-sighted men of influence, will do their utmost to see that the one bright hope of the city's future is realized. We have already referred several times to the

^{*} See this page, September 16, 1954

comprehensive plan for the forty-acre "New Barbican" site. We are This week we publish details of this intelligent scheme. confident that only muddle-headed conservatism could prevent this, or a similar truly comprehensive scheme being put into operation. If such a scheme does not go through we shall be surprised to hear of any justifiable reason for its rejection. As far as we can see there is none.



John Voelcker, Student R.I.B.A. G. M. Hobbs, A.R.I.B.A. Owen J. Howell, A.R.I.B.A. James R. Atkinson, A.R.I.B.A.

W. L. Waide, County Planning Officer,

James M. Aitken, A.R.I.B.A., A.M.T.P.I.

Hunstanton Provides "A Sense of Location"

SIR,—In an editorial comment in your issue of September 16, "The New Brutalism," the JOURNAL makes, among others, three significant observations. Firstly that the detailing of Hunstanton School is consistent, secondly that the handling of the space is remarkable, and thirdly that the school is published be-cause it is a technical achievement. In the final paragraph of the comment the writer concludes that Hunstanton is not architecture, it is given the tag of "formalist structure," a phrase which may well conceal many confusions.

confusions.

It seems that the three points made by the JOURNAL, if untainted by rather sentimentally moralistic scruples, would lead to opposite conclusions. Firstly, that the detailing of the components and the way in which they are fixed together are consistent because at root there is some total idea of the building, an image, a sign; the techniques employed have been a means of achieving this sign, they have been a means of achieving this sign, they have achieved it simply and directly. Secondly, that the control of space is remarkable because the separate volumes of the building combine into an easily comprehended whole; within this whole each functional part is

precisely and unambiguously defined as an identifiable object. Thirdly, Hunstanton is a technical achievement simply because it is architecture; technique is to be seen here in its correct rôle, the means through which architecture becomes built.

In conclusion Hunstanton is architecture

because the discipline of its form makes a very small part of the universe a very little bit more intelligible than it had been before. bit more intelligible than it had been before. It is brutal because the subtleties of "soft materials" etc., are, for the present moment, unintelligible and therefore impossibe to use positively. It is intensely human because it attempts, through its own order and consistency, to provide a sense of location in space and time to those who use it, children and aduts; it is also human because the architects took a delight in building it.

JOHN VOELCKER.

"Spec Building": Town Planning to Blame

SIR,-Practising architects must be grateful for your campaign against aesthetic control by Extra-Professional Bodies. It seems to me, however, that in attributing to them a prejudice against modern methods of design prejudice against modern methods of design you are missing the point. Surely the Building Societies are mainly interested in making money and lending it to people who wish to build. Their chief interest in a house is its resale value: if you could convince them that the young people of today will reject these ideal dolls' houses which they seem to prefer, and demand straightforward up-to-date solutions, you will be doing the profession (and especially its young members) a great service, which they will not soon forget. If you must tilt at someone over this question of aesthetic control, have a go at the TCP boys.

London.

Lest We Forget

G. M. HOBBS.

SIR,—I hope it's not too late to get in my shot on "Spec" housing, but surface mail to East Africa puts us a little out of date. Full marks to the Journal for its recent vigorous attacks on the present system. It's one thing to award a housing medal and an-other to earn one, as the "Macmillan Mon-strosities" illustrated in your recent issues show only to clearly. But I think the pro-fession is blinking one very large responsi-bility in this matter which lies fairly on its own doorstep. An enormous number of the designs and working drawings necessary to the spec. builder for submission to the authorities are prepared by semi-skilled junior architectural draughtsmen in their own time for pin-money. Many will admit to genuine aspirations to ultimate qual.fica-tion, few will achieve their goal. They will remain forever sufficiently informed, techniremain forever sumciently informed, technically, to prepare a drawing to satisfy local building bye-laws and will always constitute a menace to the welfare of the private practitioner and the progress of any possible architectural education of the prospective house owner. Principals, whether private architects, government or local government officers must get together and devise a means

of stamping on this blackleg sub-profession and the builders who approach juniors with "nods and becks and wreathed smiles" and slip them fifteen or twenty quid for a set of working drawings, knowing, nine times out of ten, that they are committing an offence against cultural interests but satisfied to be getting something "on the cheap."

OWEN J. HOWELL.

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Local Materials

SIR,—In your issue for September 30, John Mutter says, apropos the use of local building materials, that it is gratifying to find

ing materials, that it is gratifying to find that one local planning authority—the Devon County Council—is to publish an illustrated booklet giving guidance to those carrying out building operations in the Devon National Park.

This kind of publication is not new. As long ago as 1934 the Council for the Preservation of Rural England published excellent booklets for the guidance of developers in the Peak District and Lancashire. Since the passing of the Town and developers in the Peak District and Lancashire. Since the passing of the Town and Country Planning Act, 1947, at least three local planning authorities, the Kent County Council, the Isle of Ely County Council, and the Durham County Council have published similar booklets which are having some effect in improving the general standard of design.

JAMES R. ATKINSON.

Durham.

Cambridge Development Plan

SIR,—On page 397 of the JOURNAL for September 30, you quote that the Cambridge Planning Committee have stated that well-considered objections to the plan have been overruled or rejected without reasoned arguments from the M.nister. It should be made clear that the statement was made by the City of Cambridge Public Works and Town Planning Committee and not by the County Planning Committee.

W. L. WAIDE.

Cambridge.

Swedes in Scotland

SIR,—ASTRAGAL'S plea (A.J. September 16) for "return matches" to visits such as Sir Hugh Casson's China trip, caused me to think of opportunities for foreign comment at last week's International Federation of Housing and Town Planning Congress in

Edinburgh.
Enjoying a friendly Scotch one evening I was slightly startled by a suggestion from my Swedish colleagues that a little bomb dropped on the temples dedicated to Art at the Mound might not be a bad thing. They felt that the road and buildings formed a rather crude stop to the lovely garden valley which should be uninterrupted in its length and bridged by a light structure "flying" from Princes Street to the High Street.

A little shocking perhaps to the worthy citizens who have walked the Mound every

citizens who have walked the Mound every day in life, but one can visualise the wonder-fully dramatic effect (in a city full of "theatre") pictured by our Scandinavian friends.

friends.
Other refreshing comments were made in regard to the curious monuments in Edinburgh such as the little man up in the stratosphere perched on a classical co'umn (St. Andrews Square) while a storre's throw away, under a huge half-opened umbrella of a building, there sat a little white man (Sir Walter Scott)! Contradiction — why? Extremes of climate? Walter Scott)! C

Moments such as these make conferences

worth while. Co. Down.

JAMES M. AITKEN.

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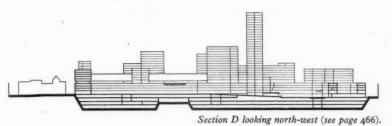
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KEN.

We illustrate this week, in full, the first proposals by Sergei Kadleigh, William Whitfield and Patrick Horsbrugh for the comprehensive development of an area near St. Paul's. This area, of some forty acres, is the last large site which remains in the central London area. (On all the other

blitzed sites are new buildings which are under way. Anything in the nature of a radical comprehensive development is therefore impossible.) We feel that the ideas lying behind the New Barbican scheme are worth detailed study because it is the only scheme put forward which shows that its architects have taken the opportunity presented to city re-designers by the blitz. The major feature of the scheme is the investment made for the City's future in the form of four floors below ground level for car parks and warehouses. These form a submerged, hidden section of an urban iceberg, which acts as a stabilizing economic influence to the whole scheme. The development above ground level resembles three or four ocean liners. Office accommo-

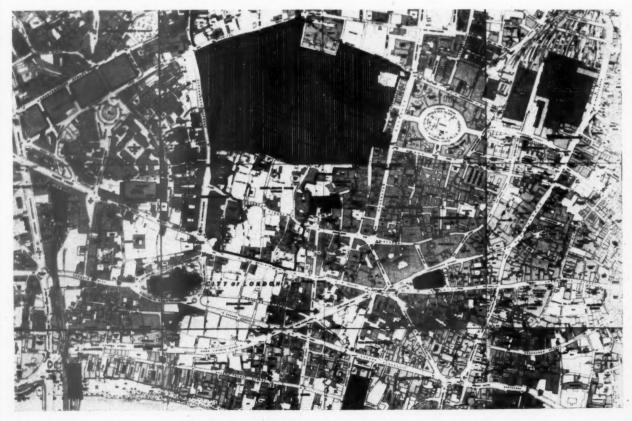


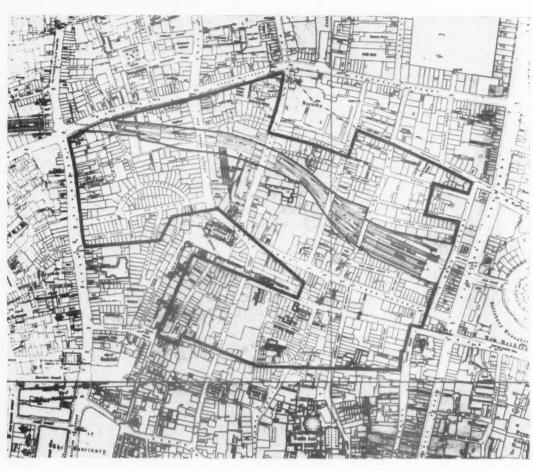
dation is grouped round the perimeter of each ship-like structure, and all the techniques of air-conditioning and artificial lighting ensure that the centres of the ships . . . factories for light industry, warehouses, etc. . . . function well. Above each main hull-on what the architects call the podium—is a superstructure of living accommodation and offices, and here the accommodation does not appear to contravene planning requirements as regards density or lighting. It should be recognized that this scheme is presented diagrammatically and that a discussion of its qualities should be concerned with the principles involved and not with any inaccurate interpretation of stylistic features. Above is a diagrammatic

NEW BARBICAN

section of the proposed scheme.

The New Barbican site, showing its relationship to St. Paul's.





The area, shown by heavy outline, to be excavated for New Barbican development.

NEW BARBICAN

designed by

KADLEIGH, WHITFIELD and HORSBRUGH

ARCHITECTS TERMS OF REFERENCE:
The architects were instructed by the New
Barbican Committee on the 28th July, 1954,
to investigate and prepare an outline project
for a comprehensive development of the area
shown bounded by dotted lines on the map
on page 457. In doing so, they were expected to
keep, the following main aims in view:

(1) To develop the site as a complete whole. (2) To provide suitable accommodation for a variety of uses all urgently needed in the City. (3) To provide for the general health, welfare, and security of the occupants and others making use of the site. (4) To relieve traffic congestion by providing adequate parking facilities for vehicles on a realistic scale. (5) To ease the burden on communications by the concentration of a variety of uses, which also fosters a sense of community. (6) To respect the historical associations, traditions, and monuments of the City. (7) To provide gardens and open space with trees and plants. (8) To prevent undue overshadowing either within the site ôr to neighbouring property. (9) To achieve a

form of development which will pay its own way and afford a reliable investment. (10) To create buildings in a form worthy of the finest City monuments—not by a slavish copy of their outward form or "style," nor by an equally thoughtless use of a "modern style," but by expressing in contemporary materials and in the service of contemporary necessities, principles common to all great monuments in whatever "style" they may happen to be wrought.

PRELIMINARY INVESTIGATION OF AREA: It was found that many applications for development approval had already been lodged in the area. On investigation it soon became apparent that the southernmost area of the site around Gresham Street and Cheapside and the most northern area of the site, north of Barbican and Beech Street, were sufficiently far advanced in piecemeal development to preclude any possibility of comprehensive development in these areas. It was, however, considered that the remainder of the area, a

site of approximately 40 acres, could still be developed as a comprehensive whole; consequently this site was chosen and work started to prepare an outline project for its development. The site chosen is shown shaded in the map on page 457.

SITE FACTORS: The historical monuments which exist within the site area.

It is understood that the City Corporation have already acquired the freehold of over 50 per cent. of the site and that in connection with the new Route 11, they have taken steps to acquire a further 25 per cent. of the site. The City therefore can be said to be committed to the ownership of some 75 per cent. of the entire site, leaving only 25 per cent. still outside their ownership.

The site is bounded on the west by Aldersgate and Barbican Station and on the east by Moorgate Station; between the two, running diagonally across the site, is the Metropolitan Railway and two tracks of British Railways. These are approx. 30 fr. below round level.

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The only buildings which are left standing on the site are St. Giles church, which is being restored, the Ironmongers Hall, a fire station, the partial ruins of the British Railways Whitecross Depot; a group of buildings housing the Acme Transport Co., and a stonemason's yard amongst other things; some buildings on the corner of Aldersgate and Barbican and some buildings around the Ironmongers Hall.

PRINCIPLES OF DEVELOPMENT: It would be possible to develop this site in the form of "piecemeal" sporadic development as opportunity presents, based on a predetermined road plan and within the framework of the L.C.C. regulations for buildings. Such a course of action might mean that all the available land is never completely taken up and that the area may well be doomed to become the City's dustbin. By this method there is little possibility of knowing in advance either when or how much financial return will accrue to the City from their ownership of this land. It would equally be possible to develop the site in what is at present known as "comprehensive development," but which is in fact a form of "visual control." In this case, would-be developers' requirements are co-related on the basis of existing demands for the site as it is and a three-dimensional model produced to

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which each individual developer is expected to conform; full control of elevations, height, type, and function of each building would be demanded.

Such a plan of action would appear to be a disastrous compromise. It would seal the future of this part of the City in accord with the present low demand on the site. This system of "visual control" is as empirical as the first alternative of "piecemeal development" as it is based on the hope that users will be found. It has, however, additional restrictions over straightforward "piecemeal development," which might make it even more difficult to find developers.

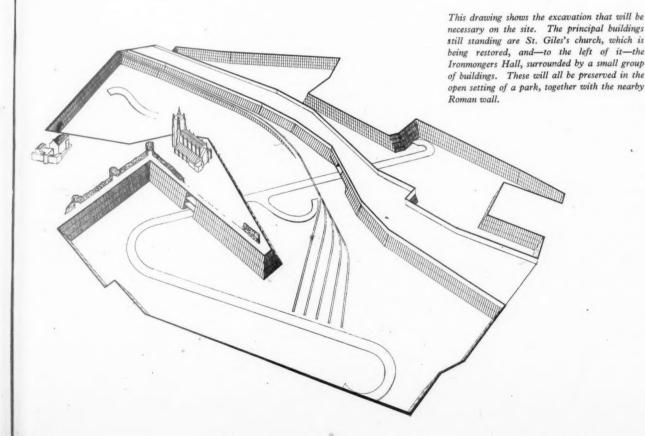
It is possible, however, to develop this site as a fully comprehensive scheme; comprehensive in the sense that the visual, social, and functional aspects are united in a complete whole, which makes out of the total development something far greater than the sum of each separate aspect.

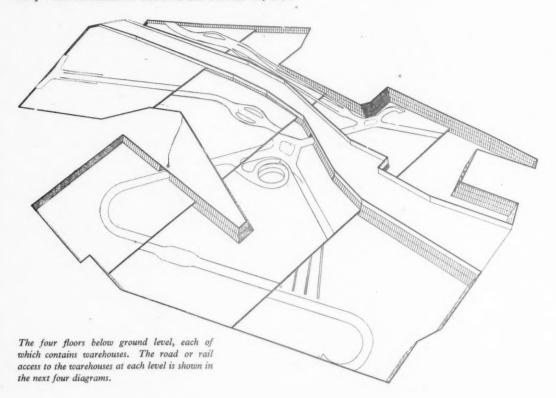
Such a form of development might be expected to create conditions to attract users rather than leaving it to chance or prejudicing the demand by additional restrictions. This way of developing offers an opportunity to reinstate the area and provide many amenities considered virtually impossible in the City today. In addition, it provides a definite planned finan-

cial return to the City on the whole site, promising to be more lucrative and more speedily realized than by other methods.

Both the "piecemeal development" and the "visual control development" depend for their practical realization on individual schemes with their own contractors building on separate plots with different organizations and at different times; each within his own congested site. Apart from other considerations, this derives no benefit from the size of the site, but forces operations to be conducted within the narrow uneconomic framework so familiar to City developers today. The fully comprehensive way of developing gives the opportunity to reap to the full the practical economic benefits from such a large area treated as a whole.

OUTLINE PROJECT: Excavation to reduced ground level: In an area as large as 40 acres, it is possible to use modern heavy earth-moving machinery economically. It is proposed therefore to excavate large areas on either side of the existing railway lines to a depth of some 60 ft. and by keeping to the normal angles of repose of the soil, economize on costly retaining walls. The historical monuments, such as the Roman wall and St. Giles church, are excluded from the excavated area so that they can be preserved in the open setting of a park.





NEW BARBICAN

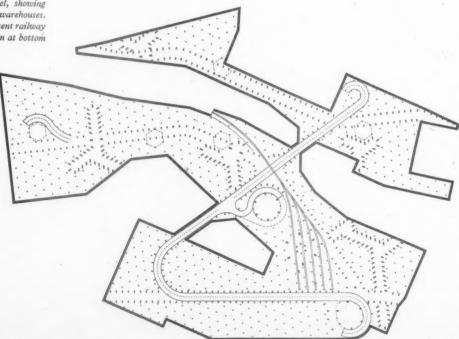
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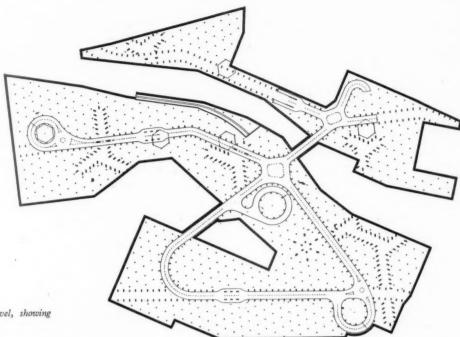
As a result of this excavation the ground level over the site will be reduced by 60 ft., the historical portion—which will become a park—being left on a 60-ft. high bluff and the existing railway will then traverse the site on an embankment approximately 30 ft. high. The spoil from this excavation can be economically transported from the site, without pre-

judice to the congested road system, on the British Railways double-track line which is not at the moment being used to its capacity. thi

Reduced ground level development: The excavated area can be filled with four floors of fully equipped warehouse accommodation served by its own road system and having access to the railway by means of new sidings.

The fourth floor below ground level, showing service road and railway access to warehouses. The railway lines link up with the present railway which crosses the site. (See diagram at bottom of page 461.)





The third floor below ground level, showing service road access to warehouses.

In addition, car parking for at least 3,000 vehicles can be provided economically within this area.

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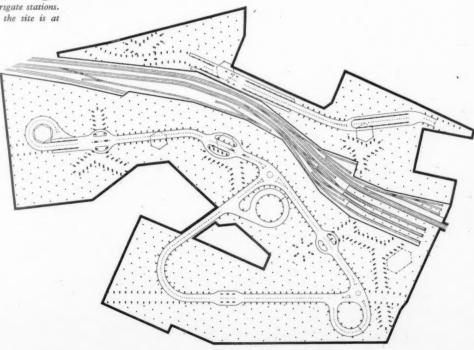
Ground level development: At ground level, the unexcavated area forming the historical centre with the remains of the Roman wall, St. Giles church, and the old graveyard, becomes a green park and extends as about 7 acres of open space

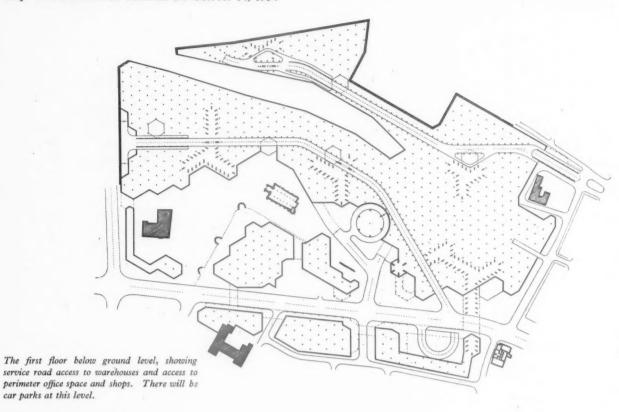
through the site joining Route 11. This would give the residents and users of the development the benefit of gardens with mature trees and shrubs.

Around the existing Ironmongers Hall (also on unexcavated ground), a site is provided where, if agreed, any of the destroyed Livery halls, which used to stand within the site area, might he rebuilt.

If, however, it is necessary to rebuild these destroyed halls on or near their original sites, it can still be achieved without seriously prejudicing the outline project. South of Route 11, the Girdlers Hall and Brewers Hall, could be rebuilt virtually on their traditional sites. North of Route 11, by the Roman wall, the

The second floor below ground level, showing service road access to warehouses. At this level there will also be car parks and access to office space and to Moorgate and Aldersgate stations. (The railway which cuts across the site is at this level.)

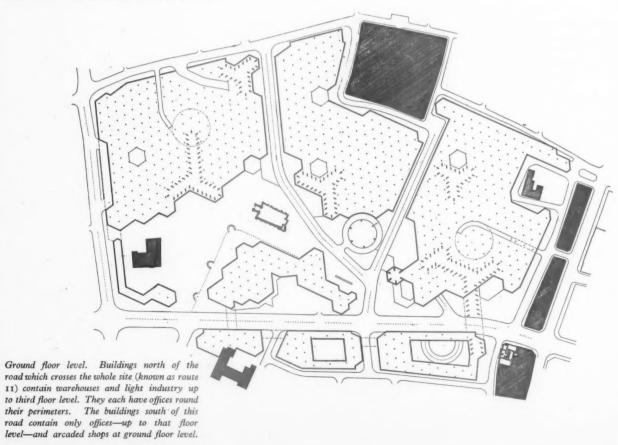


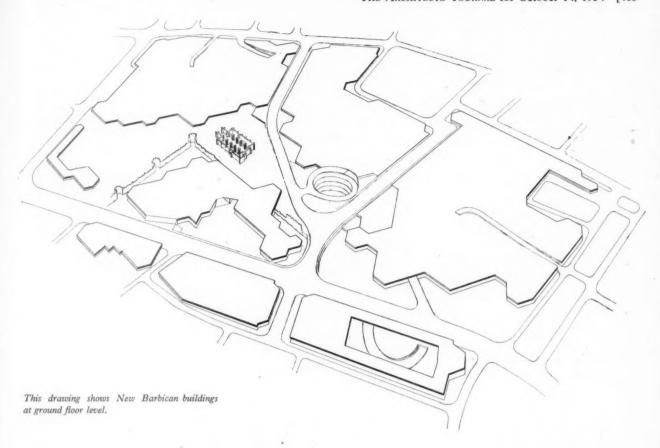


NEW BARBICAN

designed by

KADLEIGH, WHITFIELD and HORSBRUGH





Barbers Hall could be rebuilt on its present site with little modification. Moreover, St. Alphage's could be incorporated in its present position.

At this leve!, north, south and east-west through roads traverse the site, linking it with the surrounding road systems.

Shops under an arcade are proposed along parts of the south side of Route 11 and shops are included on frontages to Aldersgate.

Surface development to superimposed residential level: Above ground level, it is proposed to build three floors of warehouse or industrial accommodation. This accommodation forms three large terraces north of Route 11. These terrace blocks also contain perimeter offices.

South of Route 11, the blocks are all offices with arcaded shops on parts of the Route 11 frontage.

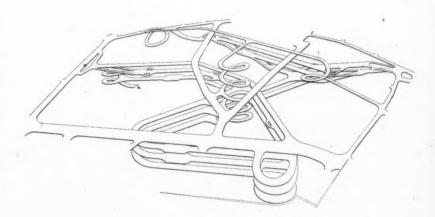
The top surfaces of all these blocks are linked together by bridges and form a continuous terrace some 45 ft. to 50 ft. above ground level, which constitutes the superimposed residential level

This residential level is served by road from Barbican to the north-west and Moorfields to the east. In addition, it is reached by escalators and lifts connected to Aldersgate Station and Moorgate Station. In effect, this residential level forms a continuous promenade deck raised sufficiently far above ground level to enable the residential community to enjoy a view of St. Paul's, the City skyline, and the hills to the south.

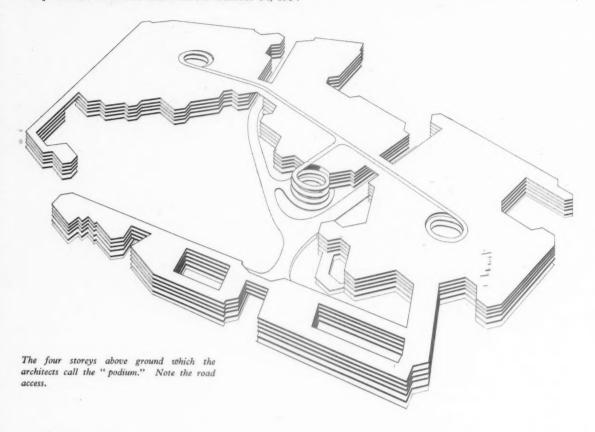
Superimposed residential level development: On this raised residential level served by road,

escalators, and lifts, it is proposed to build four-storey maisonettes.

In addition, there will be local shops, restaurants, public houses, cinema, etc., also schools and playgrounds for resident children. The 10 acres or so of open spaces will be laid out in garden terraces.

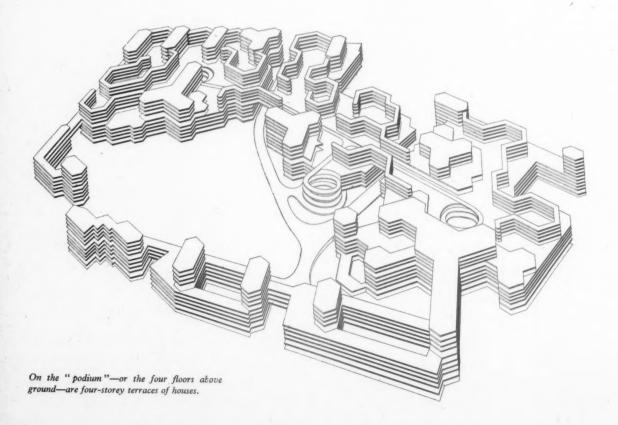


A three-times vertically distorted road diagram. The central spiral rises to a road at "podium" level, which runs the length of the site and descends, by ramps, at each end to ground level.



NEW BARBICAN

designed by KADLEIGH, WHITFIELD and HORSBRUGH

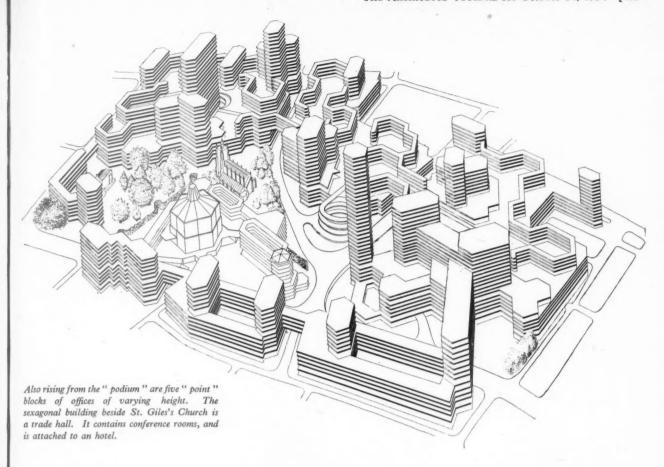


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Some low blocks of flats are provided in addition to the maisonettes,

Point blocks: Rising up above the residential area, it is proposed that there shall be five tall blocks of offices of varying heights.

The top levels of these office blocks will be high grade residential flats making use of the roof gardens on top of the offices adjoining.

These high grade flats can be served by express lifts by-passing the office levels.

Centre of trade and commerce: The whole proposed development forms an amphitheatre around the historical centre with St. Giles and the Roman wall as its focus. It is suggested that in this area within the triangle, formed by the Roman wall and Route 11, there should be built a Trade Hall with conference rooms, which could be the centre of trade and commerce for the whole of the development.

Attached to this Trade Hall, there could be suites of offices on short term hire to visitors and foreign buyers. In addition, an hotel and restaurants could be connected with the Trade Hall.

It is further suggested that the City Livery

Club is rebuilt in this area to form part of this historic and future focus to the whole scheme, in effect the whole forming a 20th century Forum.

Traffic circulation: There are three main considerations governing the traffic circulation in connection with the development of this site. Firstly, connections to existing roads leading to the site and the provision for through traffic; secondly, access to the residential area; thirdly, access to the business, commercial and parking areas, consisting of "front door," traffic to offices, etc., and "service traffic" to commercial and industrial areas.

The principles governing the layout of the road systems have been to avoid uncertainty by unfamiliar users; consequently, all "front door" roads lead from open air to open air and avoid the use of more than one spiral of descent. In most cases the roads lie beneath each other for a simplicity of direction and to enable them to be supported on the same structural cradle which can be isolated from the rest of the structure to prevent the transmission of road vibrations.

Most roads would be of the order of 36 ft. in

width allowing four lanes of traffic. "One way" lanes where they exist will have a minimum width of 18 ft. Gradients will nowhere be steeper than 1 in 15.

At points on pedestrian access into the podium and at suitable intervals along the roads, "laybys" are provided to keep roads open for moving traffic.

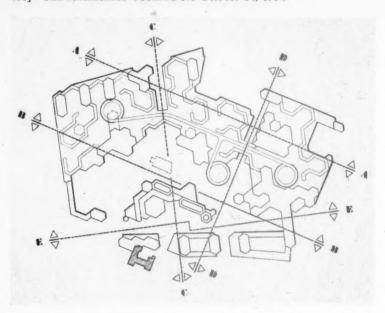
Normal ground level communications will be reserved for moving traffic, stopping traffic being mainly catered for on roads within the buildings. In this way Route 11, White and Red Cross Streets, Barbican, Beech Street, and Moorfields, will be reserved mainly for traffic on the move and thereby reduce restrictions due to stopping.

A vertical by-pass is provided which connects all levels as an alternative road in the event of temporary interruption of traffic on normal

The system of roads is designed to avoid crossings as far as practicable.

Internal roads throughout would be artificially lit at an even level of illumination.

Frontages on to the internal roads will give access to the back areas of development and



Key to elevations below and opposite.

NEW BARBICAN

designed by

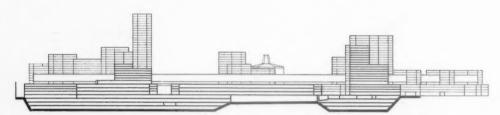
KADLEIGH, WHITFIELD and HORSBRUGH

can have characteristic facades to the individual requirements of tenants.

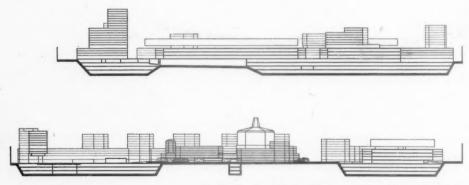
It is proposed that the streets have names in the normal way for identification, and further guidance is provided by the use of colour as in the Underground and Tube railways. In any event, the road system offers little complication for unfamiliar users, since every road maintains a positive direction equivalent to normal surface roads.

Services: It is proposed that the site should be heated by means of a district heating system. The compact nature of the development offers the fullest economy from such a system. Electricity can be distributed throughout the site from substations at strategic points linked to the main supply grid.

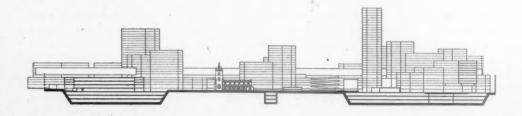
It is proposed to have a balanced ventilation in the working areas and extract systems for the roads and parking areas.



Section A: top, looking south-west; bottom, looking north-east. The white bands on all sections shown here represent living accommodation.



Section B: top, looking south-west; bottom, looking north-east.



THERMAL INSULATION COMPLETE STRUCTURES

The Architects' Journal Library of Information Sheets 489. Editor: Cotterell Butler, A.R.I.B.A.

'ROCKSIL' QUILT: THERMAL INSULATION: FLOORS AND PARTITIONS

Туре	Description	Standard sizes	Density (lb./cu. ft.)	Thermal conductivity (B.Th.U./sq. ft./ hr./°F./1 in. thickness)	Applications
Lightly- bonded Rocksil	Rocksil fibres bonded together with a non-inflammable bonding agent to form a flexible mat and rolled in paper.	Rolls 10 yd. long × 36 in. wide (other widths can be manufactured, quantity warranting.) Thicknesses: ½ in., 1 in., 1½ in., 1½ in. and 2 in.	3 (approx.)	0·24 to 0·26	Sound insulation. Sound absorption. Thermal insulation: (for caravans, etc.)
Rocksil Sewn Quilt	Felted Rocksil fibres backed on both sides with waterproof paper and stitched at intervals. Both edges are enclosed.	Rolls 20 yd. long \times 36 in. wide, ($\frac{1}{4}$ in. and 1 in.), 10 yd. long \times 36 in. wide ($1\frac{1}{4}$ in.) Thicknesses: $\frac{3}{4}$ in., 1 in. and $1\frac{1}{4}$ in.	3½ (approx.)	0·24 to 0·26	Sound insulation. Thermal insulation.
Bitumen- coated Plain Quilt	Rocksil batting backed on both sides with bitu- men-coated paper stuck to the fibres: supplied with either open or en- closed edges.	Rolls 20 yd. long × 36 in. wide. Thicknesses: 1 in., 1½ in., 1½ in. and 2 in.	3 (approx.)	0·24 to 0·26	Sound insulation. Thermal insulation. Note: Material can be used in vertical as well as horizontal positions.
Rocksil Narrow Quilt	Rocksil fibres stitched between two layers of bituminous kraft paper with edges left open.	Rolls 5 yd. long × 18 in. wide. Thicknesses: 2 in. and 3 in.	4 (approx.)	·24 to 0·26	Housing.
Rocksil Acoustic Blanket	Felted Rocksil fibres backed on both sides with flameproof scrim cloth, stitched at intervals. Both edges are enclosed.	Rolls 10 yd. long × 36 in. wide. Thicknesses: 1 in., 1½ in. and 2 in.	4 (approx.)	0·24 to 0·26	Sound absorption (usually behind perforated panels). The absorption coefficients are:— 250 c.p.s. 0·75 500 c.p.s. 0·90 2.000 c.p.s. 0·90 4 000 c.p.s. 0·95
Rocksil Infill	Lightly felted Rocksil fibres forming a thick lightweight mat.	Rolls 6 yd. long × 36 in., 18 in., 16 in., 14 in. and 12 in. wide. Nominal thicknesses: 1½ in., 2 in., 3 in. and 4 in.	1½ (approx.)	0.30	Attic insulation (between ceiling joists).
Rocksil Pugging	Felted Rocksil fibres in mat form.	Rolls 5 yd. long × 18 in. wide. Thicknesses: 2 in. and 3 in.	3 (approx.)	0·24 to 0·26	Between joists in attics and floors for both thermal in- sulation and sound dead- ening (Scottish practice).
Rocksil Batt	Felted Rocksil fibres faced with paper to facilitate rolling.	Rolls 10 yd. long \times 36 in. wide \times 1 in. thick.	3 (approx.)	0·24 to 0·26	Special insulation for pre- fabricated structures. Cylinder jackets, etc.
Felted Mat	Similar to lightly-bonded Rocksil, but with a greater impregnation of resin.	Rolls 10 yd. long × 18 in. or 36 in. wide. Thicknesses: ½ in., 1 in., 1½ in. and 1½ in.	3 (approx.)	0·24 to 0·26	Insulation of ventilation ducting, etc. As an alternative to Lightly-bonded Rocksil.
Loose Rocksil	Loose Rocksil fibres.	Supplied in 14 and 28 lb. bags.	3 to 5 packing density.	0·24 to 0·26	All forms of cavity pack- ing for thermal and sound insulation.

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28.B1 'ROCKSIL' QUILT: THERMAL INSULATION: FLOORS AND PARTITIONS

This Sheet describes the general properties of Rocksil insulating material. The tables below give the results of sound-insulating tests carried out at the National Physical Laboratory.

Material

Rocksil is a mineral wool produced from a natural rock. It is non-hygroscopic, does not rot, is proof against fungus, odourless and provides no sustenance for vermin. The forms in which it is manufactured are given on the face of the Sheet.

Sound Insulation

The following tables give the results of tests carried out at the National Physical Laboratory:

Report on the measurement, by the reverberation method, of the sound absorption coefficients of Rocksil mattresses. Reference S1086-21st Nov., 1951.

The following are the mean results obtained. practice, however, it should be realised that apart from difficulties in securing uniformity of manufacture, the acoustic absorption coefficient of a material is not an absolute physical constant, but may be influenced by the method of mounting, and the size, position and distribution of the area treated.

Material as tested (specimen 10 ft. by 10 ft. in area) Rocksil mattresses of scrim enclosed rockwool about 2 ft. 6 in. square and 2 in. thick, weighing about 1 · 0 lb. | sq. ft. Mounted on 2 in. by 1 in. vertical and horizontal battens at 2 ft. 6 in. centres on wall

Reverberation absorption coefficients (to nearest 0.05) for frequency bands in region (cycles per second)

125*	250	500	1,000	2,000	4,000
0.20	0.75	0.85	0.90	0.90	0.95

* The accuracy is subject to reservation at this frequency, where measurements present special difficulty.

Report on the insulation of a floor against air-borne and impact sound. Reference S1087—28th Sept., 1951.

Results of measurements

(a) Airborne sound insulation.—The results of the measurements of airborne sound insulation are given in the following table in which the sound insulating value is expressed as the acoustical reduction factor (or transmission loss) in decibels.

Wood joist floor, 9 in. by 2 in. joists, plasterboard celling finished with \(\frac{1}{4} \) in. skim coat of plaster. Wood raft floating on Rocksil quilt.

Mean frequency, c.p.s.	Acoustical reduction factor (decibels)
100	19
125	27
160	29
200	35
250	40
320	43
400	47
500	47
640	47
800	51
1,000	51
1,250	56
1,600	59
2,000	60
2,500	59
3,200	61
4,000	66
Mean value	
200 to 2,000 c.p.s.	49
Mean value	
100 to 3,200 c.p.s.	46

(b) Impact sound insulation.—The results of the subjective measurements of the loudness below the floor are given in the following table in terms of the improvement of the insulated floor over the wood-joist floor. The results are given to the nearest phon, but it should be noted that in subjective measurements of this nature, differences of 1 or 2 phons have little significance.

Impact sound insulation

Wood-joist floor with floating wood raft.

Insulating	Improvement (in phons) over floor with floor boards fixed to joists		
material	Sharp impacts	Dull impacts	
Rocksil quilt	10	8	

Compiled from information supplied by:

Wm. Kenyon and Sons Ltd.

Head Office: Chapel Field Works, Dukinfield, Cheshire.
Telephone: Ashton-under-Lyne 1614-7.
London Office: 50, Bloomsbury Street, W.C.1.
Telephone: Museum 6363.
Glasgow Office: 140, West George Street, Glasgow, C.2.
Telephone: Douglas 7233.

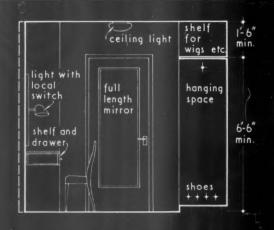
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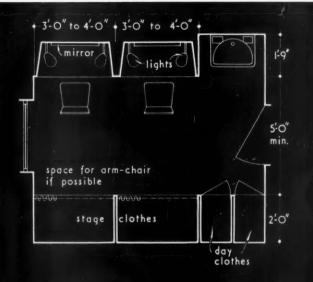
DESIGN DATA ENTERTAINMENT THEATRES

The Architects' Journal Library of Information Sheets 490 Editor: Cotterell Butler, A.R.I.B.A.



seating capacity of theatre	dressing-rooms to accommodate:
under 500	12 artists
500 to 700	15 "
700 to 800	20 "
800 to 900	30 "
900 to 1200	50 "
over 1200	7.5

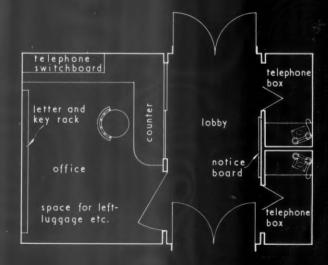
DRESSING-ROOM ACCOMMODATION.



min. floor area per artist when sharing - 44 sq.ft.
min. floor area for a single room - 88 sq.ft.
I lav. basin for 2 artists when sharing
I bath and shower on each floor
I shower adjoining a room for 6 or more artists
w.c's:

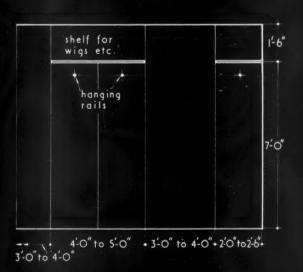
l for each sex on each floor

I adjoining a room for 8 or more artists



min. floor area of stage-door keeper's office - 50 sq.ft.
the stage-door is used by all artists, stage staff
and visitors, the lobby should not be too small

STAGE-DOOR AREA.



min. spacing of costumes in storage units - 5 per ft. run of hanging rails running wardrobe requires room with 2 sinks and an airing cupboard

WARDROBE STORAGE UNITS.

4.L5 BACKSTAGE PLANNING

This Sheet, one of a series on the planning of theatres, is intended to cover some general aspects of backstage planning.

The drawings show a plan and section through a dressing room, together with a table for estimating the dressing room accommodation required, a section through wardrobe storage units and a plan of the stage door area.

Key Dimensions

All the dimensions given on the drawings serve as a rough guide and, where possible, it is desirable to regard each as a minimum.

Dressing Rooms

It is recommended that the number of artists for whom dressing room accommodation should be provided be based on the seating capacity of the theatre. Adequate provision for the convenience and comfort of the artists should be considered.

Wardrobe Accommodation

This department is divisible into three sections:—
"Stock" wardrobe: The "stock" wardrobe consists of all the costumes acquired by a theatre over a number of years. These may in time, particularly in the case of a repertory or civic theatre, amount to thousands and storage space in convenient positions is required. Apart from costumes, storage for wigs and armoury should also be provided. Typical storage units are shown on the face of the Sheet.

"Making" wardrobe: The making of costumes is usually only undertaken by the theatre in districts remote from London, or in large civic theatres where it is found more economical to be self-contained. Where accommodation for this type of wardrobe is desired, making, fitting and staff rooms should be designed to meet specific requirements.

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"Running" wardrobe: This is a necessity in every theatre and is concerned with maintenance and repair of costumes in actual use. A large room is required, easily accessible from the dressing rooms, with racks for clothes and space for sewing, and with washing, ironing and airing facilities.

Stage Door Area

An example of a desirable arrangement for this part of the theatre is given on the face of this Sheet. In practice, few existing theatres have efficient or adequate "stage-door" conditions.

Additional Accommodation

Ideally, a theatre should possess its own green room, canteen and at least one rehearsal room, especially in a repertory theatre with a resident company.

Provision for the storage and maintenance of scenery and properties is essential in all theatres and the space provided should be directly connected with the stage (see Sheet 4.L4). It should also be possible to isolate this storage area in the event of fire to prevent the latter from spreading to the stage.

Workshops for building and painting scenery are usually separate from the theatre. Scenery, however, is very often hired.

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The development would require its own telephone exchange.

For fire fighting, sprinkler systems and automatic alarms will be installed throughout; in addition fire hydrants with a constantly maintained pressure will be provided at strategic points. The development is large enough to warrant its own fire service with personnel suitably trained and equipped for local conditions.

Refuse disposal can be of the Garchey or similar system, which would seem to be economic for this scale of development.

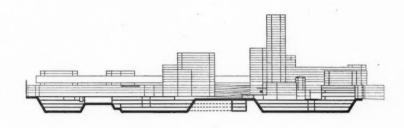
The main outfall for the drainage can be connected to the low level sewer and thence discharge from the northern outfall. Storm water can be connected to the existing storm water sewer with an outfall between Cannon Street Station and Southwark Bridge.

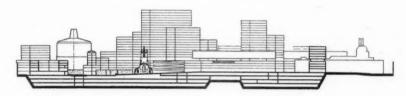
General: In general, this form of development produces a new kind of space: large horizontal areas for warehousing, offer considerable economy for modern bulk handling equipment. It also provides office accommodation in the closest proximity to storage space or light industrial space. Furthermore, it offers living accommodation in the area of people's work. In addition to all this, it provides first-class road and rail facilities and car parking space on a scale unobtainable in the City in any other way. In short, the project offers three-dimensional space of the most flexible kind, suitable for a great variety of uses, thus allowing for essential modifications during the life of the building in the most economic way.

The general shape of this proposed development grows naturally out of its surroundings and does not impose an isolated unit of development within the City. It has been grouped so as to give the utmost variety in expression and in this way harmonise with the complexity which is the City.



Section C: top, looking west; bottom, looking east.





Section D: looking south-east.

CONCLUSION: It has not been possible, due to the preliminary nature of the investigation, to explore to fine limits the potential of this site for providing valuable space. The architects have kept within the broad boundaries of the site and well within reasonable height limits. Consequently it can be assumed that the scales of accommodation provided are minimum scales and could almost certainly be increased after a more detailed investigation, if required. Even so, the areas achieved show a very marked

superiority over more usual methods of development.

It would seem from this, that such a development could play a definite part in transforming this area of the City, and hence it would steadily mount in value, becoming an ever increasingly lucrative investment.

Such a development would also seem to offer the City the best hope for a quick financial return commensurate with its expenditure in acquiring the land.

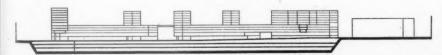
NEW BARBICA'N

designed by

KADLEIGH, WHITFIELD and HORSBRUGH



Section E: top, looking north; bottom, looking south.



BUILDING IN THE NEWS



Offices in London

These offices as 111, Westminster Bridge Road, S.E.1, built by the clients, Richard Costain, Ltd., as their new headquarters, were opened yesterday by Sir David Eccles. The architect is R. H. Wakelin, of Campbell-Jones and Sons (assistant-in-charge, Bernard F. Moss). Above is the main entrance facade, which faces north, and below part of the upper floors of the south facade.





MOW

Grants to Historic Buildings

During the past three months, the Minister of Works, Sir David Eccles, acting on recommendations by the Historic Buildings Councils for England, for Scotland, and for Wales, has offered 32 grants, totalling nearly £65,000 in respect of the following buildings:—

England: Cumberland House, York; Hazle-wood Coetle pt. Tedeacter Vorke, Pavillione

England: Cumberland House, York; Hazlewood Castle, nr. Tadcaster, Yorks; Pavilions
at Stoke Bruerne, Northants; Wrencote, Croydon; Dame Elizabeth Fuller Free School,
Watford, Herts; Holkham Hall, Norfolk;
Marlow Place, Great Marlow, Bucks; Garden Architecture at Stowe School, Bucks;
Cranbury Park, Winchester, Hants; Pittville
Pump Room, Cheltenham, Glos; 77, Pulteney
Street, Bath, Somerset; 23, Royal Crescent,
Bath, Somerset; Lydiard Park, Lydiard
Tregoz, Wilts. (2nd grant); Thornbury Castle,
Glos (2nd grant); 13, Fore Street, Chard,
Somerset; Stratford House, Birmingham;
Hagley Hall, Stourbridge, Wores; Grafton
Manor, Bromsgrove, Worcs; Birtsmoreton
Court, Worcs; Look-out Tower and Rotunda
at Croome Court, Worcs (2 grants);
Churche's Mansion, Nantwich, Ches; Hutton
John, Penrith, Cumberland.
Scotland: Newiston. West Lothian. (2nd

John, Penrith, Cumberland. Scotland: Newliston, West Lothian, (2nd grant); The Tolbooth, Kirkcudbright; Carnsalloch, Dumfries; Craigievar Castle, Aberdeen; Kelburn Castle, Ayrshire; Melville House, Fife (2nd grant). Wales: Chirk Castle, Wrexham, Denbighshire; Moor Park, Crickhowell, Brecon. The grants are made under part I of the Historic Buildings and Ancient Monuments Act 1953 towards the cost of pregntly needed.

The grants are made under part I of the Historic Buildings and Ancient Monuments Act, 1953, towards the cost of urgently needed repairs to buildings which are considered to be of outstanding historic or architectural interest. Conditions attached to the grants include the granting of reasonable opportunities to the public to view the historic

buildings.
During the same period the first grant was made under the Act for the repair of chattels in historic houses. This was for the furniture and pictures at Chastleton House, Oxfordshire. A grant for structural repairs was made earlier.

CCA

Visit to Italy

A party of eighty architects, engineers and contractors returned to London last week after a week's visit to Italy, during which they inspected new concrete buildings and civil engineering structures in Milan, Turin, Bologna, Florence and Rome. The visit was organized by the Joint Committee on Structural Concrete (representing the Cement and Concrete Association, the Prestressed Concrete Development Group and the Reinforced Concrete Association).

Concrete Association).

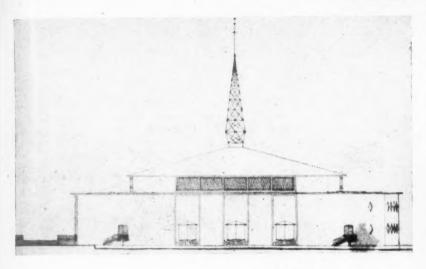
A report of the visit will appear in a later issue of the JOURNAT...

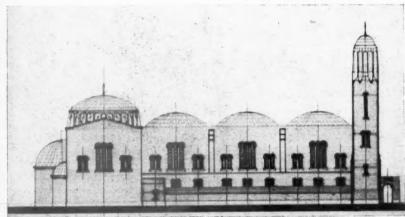
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Above, left and right : the winning design in the competition for a Catholic Church at Clonskeagh. Left: the design which is to be built. It was not a prize-winner, as a correspondent points out in his report on this page. See also page 454.

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Competition Results

A correspondent in Dublin writes the following account of the exhibition, held there recently, of competition designs sub-mitted for a new Catholic Church at Bird Avenue, Clonskeagh:—

No competition in recent years has evoked such an interested and enthusiastic response from the profession; 102 entries were submitted.

one's first reaction is that of amazement at the imaginative vitality displayed. The entire gamut ranges from sober dullness through uneasy clever-cleverness to nearblasphemy, but a surprisingly large number of designs have a welcome freshness of approach and a clear grasp of good simple planning. Fewer schemes show evidence of earseful thought house here gives to unity of planning. Fewer schemes show evidence of careful thought having been given to unity of conception and plastic form; many entries are lacking in good taste and a sense of fit-ness for the purposes of worship; too many

ness for the purposes of worship; too many display that quality which for want of a better name is called "jazz modern." But when all this has been said enough good designs remain to make the assessors' task a hard one and several schemes must just have missed being highly commended. The winning scheme by Thomas J. Ryan is, strictly speaking, a traditional one in the true sense of the word. It is carefully considered and admirably solves the many difficult problems involved in designing a church for this site. The accommodation asked for is large—1,700—yet the road is comparatively this site. The accommodation asked for is large—1,700—yet the road is comparatively narrow and the scale of the surroundings small and residential in character. The winning scheme cleverly reconciles these con-flicting claims and produces an effect harmonious and dignified without pomposity, intimate without meanness. The plan is a successful adaptation to modern structure of the traditional basilican plan in which full sight of the altar is obtained from all sides, and in which the altar stands—as it should— as the focal point of the interior, undwarfed vast frescoes, tapestries or stained glass windows.

The second and third prizewinners, Frank Barry and Fred Rogerson, are only less suc-cessful than the winner in solving the prob-lems of scale involved and, in addition, the airy simplicity of Rogerson's natural lighting

airy simplicity of Rogerson's natural hanting should be impressive without theatricality. Among many of the other schemes submitted there seemed to be evidence of the emergence of a common idiora of design, owing something to Swiss precedent but yet genuinely indigenous in feeling. An encouragingly small proportion of entries followed the dull and well-worn path of historical seelecticism. eclecticism.

The design selected by the sponsors is one of seven separate entries submitted by the firm of Messrs. Jones & Kelly. It was not awarded a prize, nor was it highly commended. There is no question of the propriety of the promoters' decision to choose an also report to the propose for the comparison. an also ran—the conditions for the competi-tion clearly stated that the sponsors did not commit themselves to choosing the winning or any other design, no doubt a perfectly proper and reasonable safeguard in the event of a divergence of taste between sponsors and assessors. It is just a pity, that is all. [The winning design and the one to be built are illustrated above and on page 454.]

Carpets take the Floor. Exhibition sponsored by the British Carpets Promotion Council. At the Tea Centre, 22, Regent Street, S.W.1.

UNTIL OCTOBER 16

Practical Aspects of the Housing Repairs and Rents Act, 1954. Paper by F. W. J. Adams, A.R.I.C.S. At the RICS, 12, Great George Street, S.W.1. 5.30 p.m. Admission by ticket only. OCTOBER 18

"White Lead" and "Magnet, a White Lead Paint." Two films at the BC, 26, Store Street, W.C.1. 12.45 p.m. OCTOBER 20

Specifications and Bills of Quantities: Their Use and Inter-relation. Discussion opened by A. R. F. Anderson, F.R.I.B.A., J. A. Burrell, F.R.I.C.S., and D. E. Woodbine Parish, F.I.O.B. At the RICS. Admission by ticket only. 6 p.m.

OCTOBER 20

"Consider your Forbears," or "Art into Landscape." Talk by G. A. Jellicoe, F.R.I.B.A., at an ILA General Meeting. At the HC, 13 Suffolk Street, S.W.1. 6.15 p.m. OCTOBER 21

Building in Concrete. Exhibition at the RIBA, 66, Portland Place, W.1. Weekdays, 10 a.m. to 7 p.m.; Saturdays, 10 a.m. to 5 p.m. OCTOBER 21 TO 30

AA Annual General Meeting. Address by the President, Peter Shepheard, A.R.I.B.A. Dinner at 6 p.m., meeting at 8 p.m. At the AA, 34, Bedford Square, W.C.1. OCTOBER 27

Foundations, Underpinning and Structural Problems at the Daily News Building in the City of London. By Frederick W. Slatter, M.I.STRUCT.E., and Arthur Brown, A.M.I., MECH.E. At the ISE, 11, Upper Belgrave Street, S.W.1. 5.55 p.m. OCTOBER 28

FACTORIES

1. in SIX HILLS WAY, STEVENAGE, HERTS.

designed by D. P. REAY, chief architect, Stevenage Development Corporation

L. G. VINCENT, deputy chief architect; L. W. AKED, group leader

B. J. ALFORD, M. W. WHITWORTH and D. A. CALLAGHAN, assistant architects

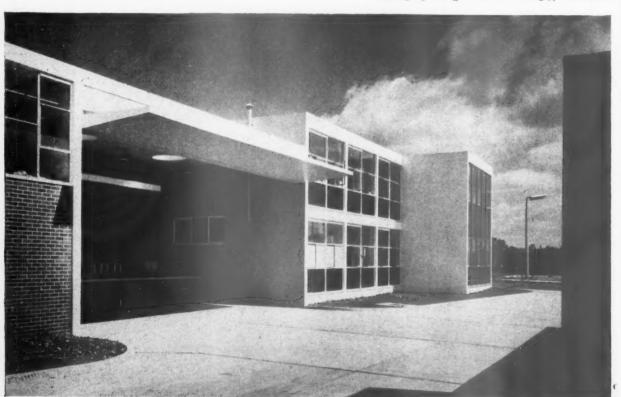
consultants, reinforced concrete, BARREL VAULT ROOFS LTD., quantity surveyors, GARDINER and THEOBALD

2. at BARUGH GREEN, BARNSLEY, YORKSHIRE

designed by NOEL HEPPENSTALL

The Stevenage factory, designed by the Development Corporation for British Visqueen Ltd., is on the new industrial estate at Stevenage New Town. The factory is designed for the manufacture of polythene film, a transparent flexible packing material made down to a thickness of o ooi in., by a continuous process. The factory is the largest unit for polythene film in the world, outside the USA. The client required the whole building for occupation within 12 months from the commencement of the contract in June, 1953. The building was ready by June this year.

Loading bay and office block at Stevenage, from the south.



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SITE.—The factory is situated on a corner site adjacent to a roundabout on the main approach road to the industrial area on the west side of the town. The office block and main entrance face the roundabout and are 60 ft. from the road to allow for future cycle tracks and subway. Allowance had to be made in the siting of the building for future expansion to the north and west.

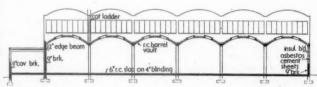
PLAN.—The production area of 22,500 sq. ft. has two-thirds of its area with a 16-ft. clear height under the valleys and the remaining third with 32-ft. height to accommodate process machinery. The service building of 1,700 sq. ft. consists of boiler house, workshop, switch room and loading bay. The two-storey office block has an area of 5,350 sq. ft. The high level section of the production area had to be completed in nine months so that the process machinery could be installed while the main building contract was completed. A grid of 25 ft. by 50 ft. was adopted to allow maximum freedom for future adjustment and changes in the position of machinery.

CONSTRUCTION.—There are r.c. columns and



a barrel vault roof to the production area, and r.c. columns, floor and roof slabs to the office block. The ground is shrinkable clay, generally fairly firm, but as numerous pockets of softer clay were encountered the majority of the 61 bases to the columns were individually designed to suit the exact site conditions. The 4-in. blinding concrete was laid direct on the dry clay immediately the levels had been reduced, with holes left for excavating

Above, part of the low-level production area, which has a concrete barrel-vault roof carried on r.c. columns. The floor finish is 1-in. hardened dust-proofed and waterproofed granolithic. External finishes include: north well, asbestos cement sheets; west and south walls, asbestos cement at high level, brickwork at low level; east wall, brickwork.



Section A-A

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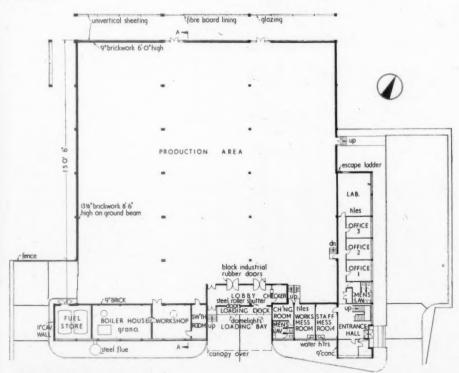
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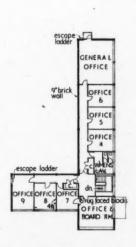
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FACTORIES

1. at STEVENAGE, HERTS. designed by D. P. REAY

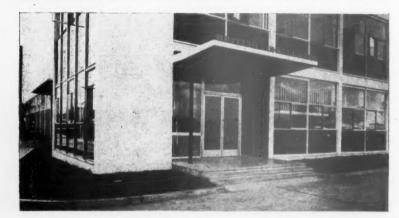


Ground floor plan [Scale: 1," = 1' 0']



First floor plan







FACTORIES

1. at STEVENAGE, HERTS.
designed by D. P. REAY

Top: the production area, left; service building, centre, and office block, right. Centre, office entrance. Above, staircase and hall in the office block.

column bases and this kept the site clean during construction and acted as a sound base for the tubular scaffolding framework supporting the barrel vault shuttering. There is an 8-in. double r.c. ground floor slab to the high level section and 6-in. single r.c. slab to the low level section. The r.c. columns and edge beams are left exposed and the infilling panels are of brickwork or asbestos sheeting.

FINISHES.-In the office block floor finishes are linoleum tiles on the first floor, terrazzo in the entrance hall, quarry tiles in lavatories and thermoplastic vinyl tiles on ground floor. In the office block there are panels, below window sill level, of black glass ply backed by 4½-in. brickwork. The boilerhouse and workshop have blue engineering bricks up to 8 ft. 6 in. height, and elsewhere facing bricks are red tapped Leicester wire cuts. The barrel vault roof is screeded externally, with 2-in. metamica insulation, and finished with two layers of bituminous felt. Meta-mica plaster 1-in. thick was applied to the underside as thermal insulation, to absorb condensation and to reduce sound reflection. The flat roof also has 11-in. meta-mica screed and three layers of bituminous felt. The meta-mica screed was used to reduce to a minimum the amount of thermal movement due to large areas of the concrete frame being left exposed. Other precautions were a 4-in. by ½-in. strip of impregnated cane fibre inserted where brickwork abuts columns and recessed I in. from the face of the brickwork. The joint is pointed with a ½-in. by ½-in. mastic seal. Thus the juncture of infilling panels with the frame forms expansion joints. Internally the

production an insular offices, profinished has a r. risers an

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FACTORIES

1. at STEVENAGE, HERTS.

designed by D. P. REAY

production area has walls of painted brickwork and an insulating board lining at high level. In the offices, plastered walls and ceilings on partitions are finished with emulsion paint. The office staircase has a r.c. frame with 11-in. Burma teak treads,

risers and handrail and mild steel balusters.

Details at A, B and C

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Japly roofing felt-two layers finished in chase-top layer corried over parapet 3 ply roofing felt on the screed NOMENS CORR LAV Impregnated cain fibre wired to brickwork MENS CORR

[Scale: 1 " = 1'0"]

SERVICES.-The heating is by accelerated lowpressure hot water circulating through unit heaters in the production area and radiators in the offices. The unit heaters circulate heated air in the winter and fresh air in the summer. The contract price was £88,646. The cost per ft. cube was 2s. 4d. and per ft. sq. 58s. 2d.

The general contractors were Gilbert-Ash Ltd. For sub-contractors see page 480.

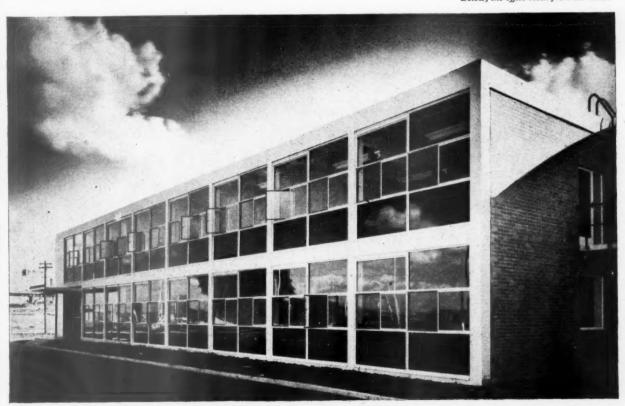
[Scale: \frac{1}{2}" = 1' 0"] 3 ply roofing on 112" vermiculite screed r.c. roof slob from 6" to 4" thick 6" thick rug faced blocks WOMENS BOARD ROOM 9"brickwork 5/8" plaster in sed tiles 6°rc.slob LABORATORY OFFICE RECEPTION LAVATORY creed with ebonite strips 5"concrete on 4" binding

Details at D and E

Longitudinal section through office block [Scale: \(\frac{1}{4}'' = 1'0' \)]

Cross section

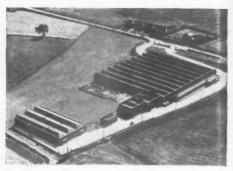
Below, the office block from the north.







Above right, aerial view of the factory from the north-west. Above, part of the production area of 300 ft. by 240 ft. Left, another view of some of the 30-ft. sq. bays in the production area. The frames are of welded steel.



north light roof truss was designed to give the best constant light, and the insulated steel roof decking, with cast-in-situ concrete gutters eliminates possible dust or water penetration whilst giving maximum insulation. Thermal movement was not provided for in the design, since movement from subsidence has been allowed for. The factory area has, in effect, been built in two units, reach 240 ft. by 150 ft. on a separate r.c. grid with double stanchions and a flexible joint through the gutters and walls where these sections meet.

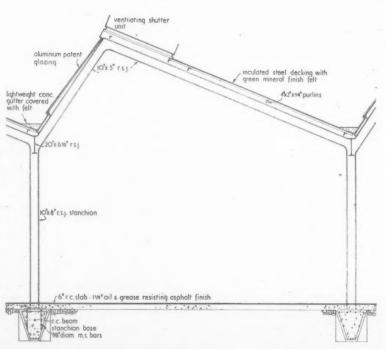
The general contractors were Vernon Dunk Ltd. Sub-contractors on page 480.

FACTORIES

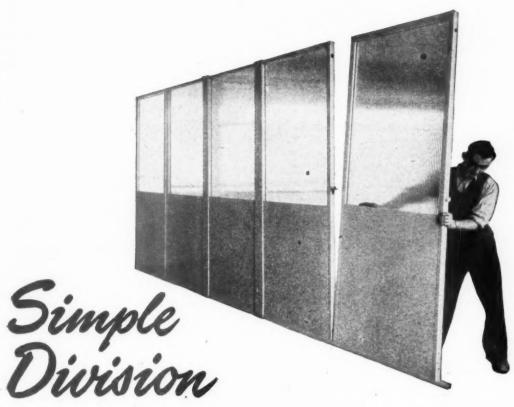
2. at BARNSLEY, YORKS.

designed by NOEL HEPPENSTALL

GENERAL.—This factory near Barnsley for Brook Motors Ltd., with a production area of 300 ft. by 240 ft., has a welded steel frame, stanchions and roof lights designed to give the maximum flexibility in planning. The bays are 30 ft. square to meet the particular needs of the clients, who may require to alter the layout of the factory from time to time. The stanchions are needed at that spacing in order that the 15-ft. span jib cranes may work from them, whilst keeping the cost of roof steelwork economical in 30-ft. bays. The trusses were designed free of horizontal steel members so that travelling cranes can be installed in any bay of the factory and to avoid dust accumulation. The



Section through typical bay [Scale: 1" = 1'0"]



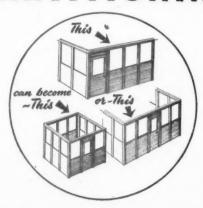
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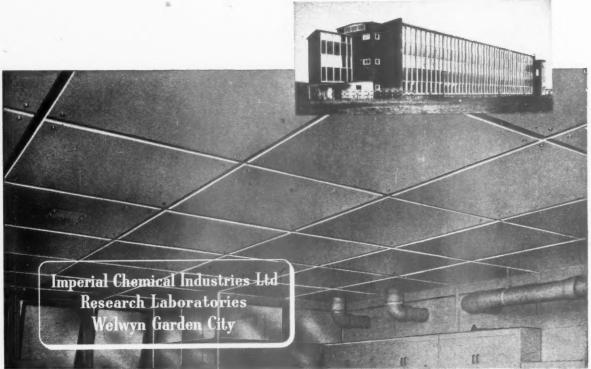
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General Contractors: Holland & Hannen and Cubitts Ltd.

The constructional feature of the ceiling panels was a core of $1\frac{1}{2}$ " compressed granulated cork slab bonded on both sides to sheet Aluminium, the underside sheet being perforated to provide sound absorption. A synthetic resin adhesive was used which would, in fact, withstand immersion in boiling water. The size of each panel was $3'10'' \times 3'10''$ and the metal was turned over on all edges to make a seal. They were grooved for fixing with "Armourply" strips, 2" wide, to make up the 4' module.

The panels were designed to be demountable to give easy access to the main services running in the depth of the floor.

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TECHNICAL SECTION

During this week the BSI is acting as the host to representatives of those eleven countries who are taking part in the European Productivity Agency's project for Modular Co-ordination in Building. The practical difficulty of "international" co-operation on this subject is that it is not yet a live issue on the international scale. Since there is so far little exchange of building components between European countries, there is no pressing reason for the nations to ensure that the components they manufacture fit into a common dimensional system. For this reason it seems likely that this particular project will make slower progress than, say, the projects of the International Electrotechnical Commission where actual dimensional embarrassments act as a constant spur to progress. This is not to say that such get-togethers are useless; but we should not expect too much from them too quickly.

This week's special article

27 FURNITURE AND FITTINGS follow up of the ironmongery issue

The number preceding the week's special article or survey indicates the appropriate subject heading of the Information Centre to which the article or survey belongs. The complete list of these headings is printed from time-to-time. To each survey is appended a list of recently-published and relevant Information Centre items. Further and earlier information can be found by referring to the index published free each year.

In the editorial to our "Architectural Ironmongery" issue of September 9 we invited readers to let us know of interesting items of ironmongery which were omitted from our account. This week, therefore, we take the opportunity of publishing a description of six items which have since been brought to our notice. For five of these we have to thank the manufacturers concerned, and for the sixth—the "Odooro" automatic fastener— we have to thank C. R. Vinycomb.

Additional items which have been brought to our notice since the publication of the Ironmongery issue ina cylinder-braced clude mortice clawbolt deadlock, a press-button mortice-latch, a spring wedge automatic fastener, a new method of spindling door knobs, a mortice door bolt

for double doors which ensures that you do not forget to shoot it, and a cable-type remote-control windowgearing, which permits the cable length to be considerably greater than the maximum of 20 feet mentioned for this type of gearing in our article on "Architectural Ironmongery."

FINE BUILDINGS ...

Everywhere these days you can see really fine buildings—attractively designed and really well-built. Such a building is illustrated below—Private House of F. L. Hannam, A.R.I.B.A., 10 Stoke Hill, Bristol, 9.

Architects: Burrough & Hannam, F/A.R.I.B.A., Bristol, 1.

Builders: Western Homes & Estates Ltd., Bristol. 8.

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Fig. 1.
mortice
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fixings.
Fig. 2.
Fig. 3.

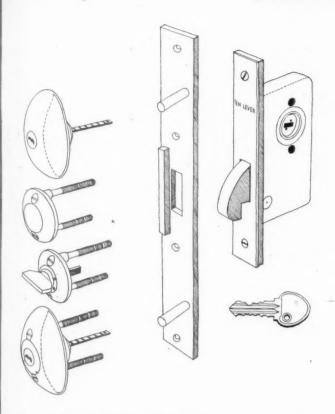




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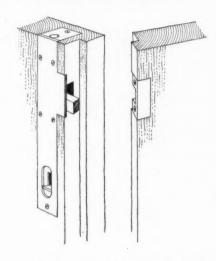


Fig. 4. (above). Flush door bolt with projecting spur. Fig. 5. (below). Patent spindling.

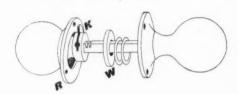
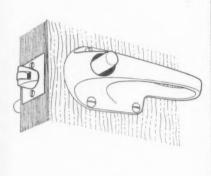
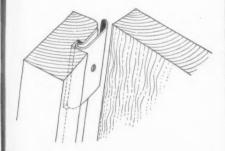


Fig. 1. (above). Ten-lever steel-clad cylinder-braced mortice clawbolt deadlock, showing, top left, the outside cylinder and, below it, three alternative internal fixings.

Fig. 2. (below). Press-button mortice latch.
Fig. 3. (bottom). Spring-wedge automatic fastener.





IRONMONGERY FOR DOORS

The first item is a ten-lever steel-clad cylinder-braced mortice clawbolt deadlock which, in its locking arrangements, belongs to the same family as the rim automatic deadlock shown in Fig. 31 on page 311 of our previous article. For both are ten-lever cylinderbraced deadlocks giving a high degree of natural security, enhanced by the fact that the keys are so designed that they cannot be duplicated. But, regarded as a lock type, this is a variant of the ordinary mortice lock shown in Fig. 21 on page 310, having the advantage not only of the superior lock mechanism but also of the claw bolt which is fitted with a hardened steel pin to defeat the hacksaw. drawings to the left of the figure represent (reading from the top downwards) the outside cylinder, an inside fixing unit for lock-up shops and garages where there is no need for access to the lock from this direction, an internal turn-knob for strongrooms and inflammable storage doors, and an internal cylinder.

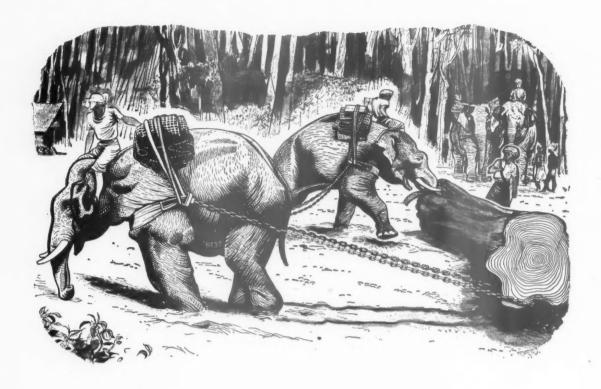
The second item (Fig. 2) is, in effect, a new variant on the "latch with spring bolt, operated by means of a handle" which was represented in Fig. 17 on page 310. Described as a "press-button mortice-latch," it comprises a fixed handle in which is incorporated a press

button which releases the latch. The chief advantage claimed for this type is that by having a fixed as opposed to a movable handle, wear on the finish is reduced. The latch is also supplied in half sets for cupboard doors.

The third item (Fig. 3) belongs in the same context in that it aims at providing for an alternative to the mortice latch, though in fact it is a door fastener and not a latch at all. This spring-wedge automatic fastener is a spring clip of heavy-gauge phosphor bronze, which is screwed to the rebate of the jamb. This is, of course, only suitable for internal doors, and requires that the door itself be fitted with a knob or handle. The chief advantage over any form of latch is that the door does not require to be closed by hand: when pushed it closes by itself with a faint "clunk."

BOLTS AND CABIN HOOKS

The fourth item (Fig. 4) is a form of bolt for use on double-doors, a subject which was discussed on page 314. It is a flush bolt which is provided with a metal spur (or "hook" as it is described by the makers) which is linked with the operation of the bolt. This fitting is attached to the leaf, which is the first to close and is so designed that the spur catches on the second leaf and prevents it from being closed unless



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and until the bolt is shot home. It is thus impossible for anyone closing the doors to forget to shoot the bolt.

DOOR HANDLES

The fifth item is a variation on "Mace's rose" and "Duce's spindle," which were described in Fig. 47 on page 316. The operation of "Gibbons improved spindle" can be understood by reference to Fig. 5. The pivot key K engages in a slotted spindle and is locked by the rose R when in position on the door. The thick iron washer W fills the recess in the back of the rose, making the neck of knob and rose flush Washers are proagainst the door. vided for extra adjustment. By this means the fixing is wholly concealed and all the strain is carried by the spindle.

IRONMONGERY FOR WINDOWS REMOTE CONTROL WINDOW GEARING

In the paragraph which appeared under the above heading in the original text (page 329) we stated (speaking of cable-operated window gearing) that "the maximum cable length is about 20 ft." But the makers of the cable type shown in Fig. 6 state that this cable has been used in hundreds of installations in lengths up to and in excess of 300 ft.

The cable is constructed of a central tension/compression core with a continuous helical outer winding that functions as a drive rack, both being of high-tensile steel wire. The advantages of this cable type are that it gives great flexibility without loss of high loading



Fig. 6. Helical cable remote control window gearing.

capacity, that it presents a reduced area to rub against the conduit, and that the helices retain their lubricant.

The Architects' Journal for October 14, 1954

LIST OF SUPPLIERS

1. Ingersoll Locks Ltd., Ingersoll House, Kingsway, London, W.C.2.

2. Frederick Giles & Sons Ltd., 117-122,

Scholefield Street, Birmingham, 7.

3. Evered & Co. Ltd., Surrey Works, Smethwick, 40.

4 & 5. James Gibbons Ltd., 74, Southamp-

ton Row, London, W.C.1.
6. Teleflex Products Ltd., Teleflex Works, Chadwell Heath, Essex.

THE INDUSTRY

From the Industry this week, Brian Grant reports on a dual-purpose heat pump, flushing valves and a new W.C. syphon, a booklet on stage lighting, another on bitumen for thermal insulation, and new light fittings.

ANOTHER HEAT PUMP

Ferranti have just announced a heat pump which is designed to cool the larder and at the same time heat the hot water. The unit measures 16 inches square on plan and is 36 in. high and is placed in the larder, which, for the best results, should not have a capacity of more than 120 cubic feet, and in new houses it would be preferable for the larder walls to be built of insulating blocks. The walls to be out of insulating blocks. The only limitation is that the total length of flow and return pipe from the Fridge-Heater to the hot water cylinder must not be more than 40 ft., but in view of the usual bath-room-over kitchen planning this should not be difficult to arrange and the cylinder can be in the linen cuphoard as usual. Flow and be in the linen cupboard as usual. Flow and return pipes are ½ in. and should be carefully lagged, as of course should the cylinder.

The heat for the water is extracted from the larder air which is blown across the cooling coils of the refrigerator unit by a fan, cooling it to about 20 deg. F less than the external temperature. The larder door and window should be fitted with draught excluders and should be littled with draught excluders and the shelving arranged so that the more perishable food can be stored below the level of the top of the machine. Ice making is also possible, as there is a separate control for turning off the fan, though this slows down the water heating process. In normal use the heat put into the water is about 3 times the amount used in the compressor, and although the current consumed will depend on the hot water used the makers give a figure of about one unit per day for each person in the house.

Installation is quite straightforward and a 5 amp. socket is enough for the current supply. Moisture in the larder air condenses on the cooling coils and may be drained into a bucket or through a hole in the larder wall to the outside: the quantity of condensate

is small—about 4 pints per week.

Price is just over £141, and the machine is guaranteed for 12 months.

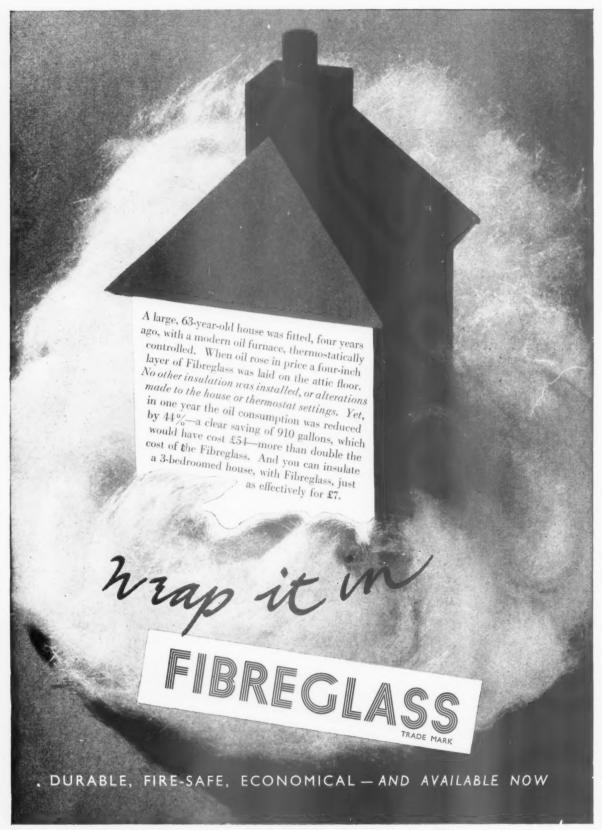
(Ferranti Ltd., Heat Pump Dept., Moston, Manchester 10).

FLUSHING VALVES

Automatic flushing valves have been on sale in this country for 25 years or more. Kowe Bros. have been British distributors for the American Sloan valve since 1928, but during and since the war importation has been very



The Ferranti Heat Pump.



Fibreglass Limited, Ravenhead, St. Helens, Lancs. (St. Helens 4224)



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THAWI

No dou properly but nor froster step-dov mains v long lea to the f difficult owing to currency restrictions. Arrangements have now been made, however, for the valves to be made in this country under licence, and their advantages are set out in a new catalogue which shows how they work and gives useful information on pipe sizing. (Rowe Bros. & Co Ltd., Pall Mall, Liverpool).

W. C. SYPHONS IN PLASTIC

Shires & Co. have announced a new "King-fisher" syphon made in a special grade of polythene which should be unaffected by any type of water supply. The body is moulded in one piece and the unit has a large cylinder and throat to allow a full water way. The new syphon is available in all sizes and bores to suit every type of flat bottom cistern in metal, fireclay or plastic. (Shires & Co., (London) Ltd., Guiseley, Yorks).

AMATEUR THEATRICALS

Stage Lighting on a Shoestring is the title of a (free) Strand Electric publication, written with a pretty clear understanding of the problems, notably money, which beset the average amateur dramatic society. A lighting scheme for a small stage has been worked out in five instalments with a total cost of £115. For societies where this would be too much the firm runs a hire service whose charges seem remarkably reasonable. (The Strand Electric & Engineering Co., Ltd., 29 King St., Covent Garden, London, W.C.2).

THAWING PIPES ELECTRICALLY

No doubt we are all agreed that ripes in a properly designed house should never freeze, but none the less the Radford electric defroster seems a useful device. It consists of a step-down transformer which reduces the mains voltage to a safe level and a pair of long leads so that the current can be applied to the frozen pipe. With an input of 2 kilo-

Below (left), Radford electric defroster, (right), five-branch ceiling pendant by Cone Fittings.

watts it will melt ice in a half-inch pipe at the rate of 9 ft. a minute. Plastic pipes can be treated as long as there are taps and metal fittings through which the current can be applied. The great advantage of a system such as this is that it is very quick in operation, that it can be used where pipes are inaccessible, or even where they pass through a wall, and there is no danger of damage to decorations as there is with the usual blow-lamp. (Radford Electronics Ltd., 149 Newfoundland Road, Bristol, 2).

BITUMEN FOR INSULATION

Berry Wiggins & Co. have just published a 70-page book on Bitumen Coatings for Thermal Insulation. It deals very thoroughly with high and low temperature insulation and the gas proofing of fruit storage chambers, and contains the necessary specifications and tables of covering capacity for the firm's various products. These include Aquaseal emulsions and Kingsnorth compounds or Tensulacs. They can be applied by trowel, or if necessary by brush or spray.

The subject is dealt with very thoroughly and the book provides more information than most architects will need. The specifications, however, are of considerable value and the specialist will find the rest of the book excellent. (Berry Wiggins & Co. Ltd., Field House, Breams Buildings, London, E. C.4).

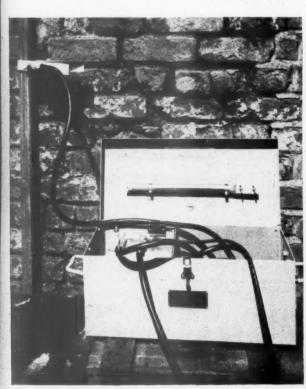
NEW LIGHT FITTINGS

The first models produced by Cone Fittings were noticed here two years ago or more. Sundry other versions have been produced since then, and two further types have just been announced—a wall bracket and a ceiling fitting with either three or five branches. Shades are either in spun aluminium, enamelled in a range of eight colours, or pleated acetate which can be removed for cleaning, while in the ceiling pendants the shades can be inverted if required. Prices vary from 37s. 3d. for the wall fitting with acetate shade to £10 10s. for the five branch ceiling pendant. (Cone Fittings, 9 Rosemont Road, Hampstead, London, N.W.3.)

Buildings Illustrated

Factory for British Visqueen Ltd. in Six Hills Way, Stevenage, Herts. (Pages 470-473). Designed by Stevenage Development Corporation; Chief Architect: D. P. Reay, BARCH., A.R.I.B.A., A.M.T.P.I.; Deputy Chief Architect: L. G. Vincent, A.R.I.B.A., A.M.T.P.I.; Group Leader: L. W. Aked, B.ARCH., A.R.I.B.A.; Assistant Architects: B. J. Alford, A.R.I.B.A., M. W. Whitworth, M.A. (CANTAB), A.R.I.B.A., D. A. Callaghan, DIPL. ARCH., A.R.I.B.A. Consultants: (R.C. Frame) Barrel Vault Roofs Ltd. Quantity Surveyors: Gardiner & Theobald. General Contractor: Gilbert-Ash Ltd. Clerk of Works: W. Olney. General Foreman: E. A. Page. Sub-contractors: excavation, Stutley Bros. Ltd.; vertical dampcourses, Wm. Briggs & Sons Ltd.; reinforcement, Twisteel Ltd.; bricks, E. H. Smith; structural steel, T. C. Jones & Co. Ltd.; asbestos cement sheeting, Richardson Roofing Co. Ltd.; roofing felt, Macartney Ltd.; partitions, Stramit Boards Ltd.; glass, Faulkner Green & Co. Ltd.; patent flooring, Semtex Ltd.; central heating, ventilation, Jas. Combe & Son Ltd.; gas fixtures, Eastern Gas Board; electric wiring, Eastern Electricity Board; plumbing, R. J. Audrey Ltd.; sanitary fittings, Stitsons Sanitary Fittings Ltd.; door furniture, Dryad Metal Works Ltd.; steel casements, patent glazing, Williams & Williams Ltd.; rolling shutters, Mather & Platt Ltd.; rubber doors, W. N. Froy & Sons Ltd.; sliding doors, Fosters (Woodworkers) Ltd.; plaster, Alan Milne Ltd., balustrades, catladders, Clark Hunt & Co.; joinery, P. H. Barker & Sons Ltd.; flush doors, F. Hills & Sons Ltd.; terrazzo, W. B. Simpson & Sons Ltd.; painting, M. Labbett & Sons, Nottingham; paints Screeton Paintmakers Ltd., Imperial Chemical Industries Ltd.; fencing, Penfold Fencing Co. Ltd.; signs, The Lettering Centre.

Factory and Canteen at Barugh Green, Barnsley, Yorkshire, for Brook Motors Ltd. (Page 474). Architect: Noel Heppenstall, L.R.I.B.A. General Contractor: Vernon Dunk Ltd. General Foreman: T. Walms-





Readers requiring up-to-date information on building products and services may complete and post this form to the Architects' Journal 9, 11 and 13, Queen Anne's Gate, S.W.1

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Please ask manufacturers to send further particulars to:—

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ley. Sub-contractors: asphalt, Asphaltic Roadways Ltd.; reinforced concrete, British Reinforced Concrete Ltd.; facing bricks, Proctor & Lavender Ltd.; facing bricks, Proctor & Lavender Ltd.; artificial stone, George Greenwood & Sons; structural steel, James Austin & Sons Ltd.; tiles, Carter & Co. Ltd.; special roofings, The Ruberoid Co. Ltd.; glass, Pilkington Bros. Ltd., and Chance Bros. Ltd.; patent glazing, W. H. Heywood & Co. Ltd.; woodblock flooring, J. A. Hewetson & Co. Ltd.; central heating, T. H. Rayner & Sons Ltd.; gasfittings, North Eastern Gas Board; boilers, Beeston Boiler Co. Ltd.; electric wiring, Brook Motors Ltd.; ventilation, Hills (West Bromwich) Ltd.; sanitary fittings, Twyford Ltd.; door furniture, Lockerbie & Wilkinson (Birmingham) Ltd.; telephones, Communications Systems Ltd.; Automatic Telephone & Electric Co. Ltd.; folding gates, Potter Rax Ltd.; metalwork, Isaac Robson & Co. Ltd.; shrubs and trees, Conways Ltd.; signs, Franco Signs.

Announcements

The Royal West of England Academy School of Architecture intends to hold a Symposium on "Roofing Materials" on the afternoon of Thursday, October 21, at the School. "Traditional Materials" and "Materials More Recently Developed" will be dealt with at separate sessions and it is hoped that architects, surveyors and builders will speak. There will be an exhibition of samples of materials and literature on proprietary materials and systems on view at the same time. A charge of 2s. 6d. per person will be made to cover expenses and a copy of a record of the proceedings, and tea will be available at a small charge. Anyone wishing to attend should write now to the School Secretary, RWA School of Architecture, 25, Great George Street, Bristol, 1.

Brian M. Jackson, A.R.I.C.S., has been taken into partnership by Messrs. Harris & Porter, chartered quantity surveyors, of Adelphi Terrace House, 3, Robert Street, London, W.C.2, and of Portsmouth and the Isle of Wight.

Mrs. April Swayne-Thomas, Flat 3, 64 Kensington Gardens Square, W.2, is resuming her practice as a mural painter in this country on her return from practising in Australia and the Far East.

An architects' advisory bureau has been formed by Messrs. Telephone Rentals Ltd. They will carry out surveys, prepare reports, supply drawings, technical information and specifications to architects on problems of internal broadcasting, internal telephone systems and time control specifications.

Blundell, Spence & Co. Ltd., have appointed Richard John Lant, a former associate of the RIBA as manager of their newly-formed South-Western Sales Area, with headquarters at their new depot at Feeder Road, Bristol.

FEB (Great Britain) Ltd. are offering a lecture service consisting of a film and talk on concrete problems, and the technique of air-entrained concrete and mortars, combined with a plastering and bricklaying demonstration. Professional associations interested should write direct to A. G. Elliott, Technical Director, FEB (Great Britain) Ltd., Albany Road, Chorlton-cum-Hardy, Manchester, 21.

The Exeter address of Messrs. Henry Hope & Sons Ltd. is 61, Howell Road, Exeter. Telephone number, Exeter 58331.

The Nottingham address of Messrs. Williams and Williams Ltd., has been changed to County Chambers, 4, Bridlesmith Gate, Nottingham, now also the headquarters of the North Eastern Divisional Sales Manager, Mr. H. Yard, and the Nottingham Area Manager, Mr. A. S. Reynolds.

The Lancashire and Cheshire Branch of The Faculty of Building held their inaugural Meeting in Manchester on October 2.

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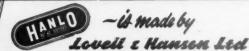
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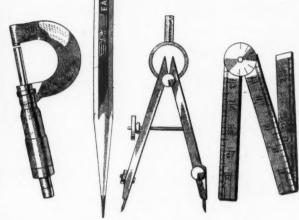
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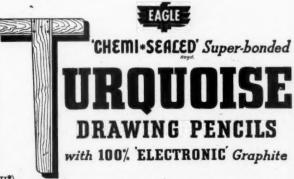


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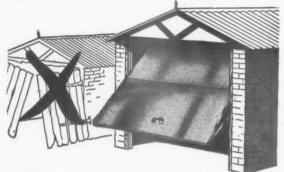




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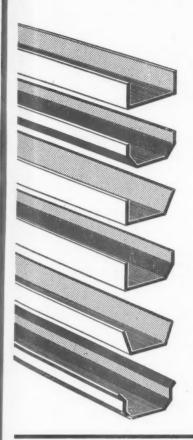
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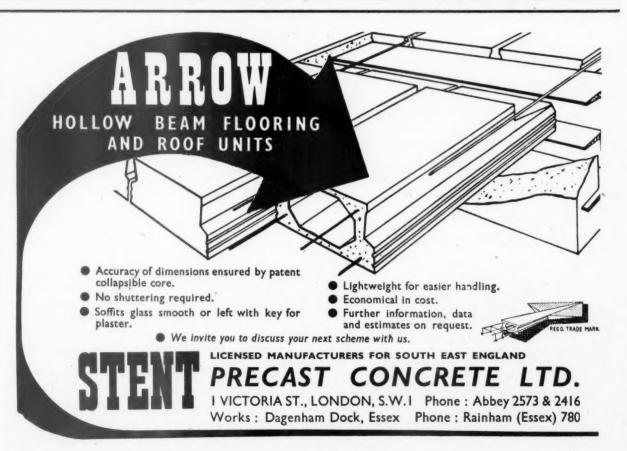
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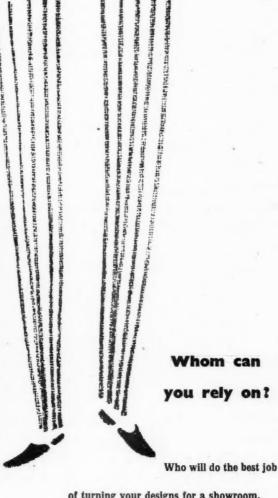
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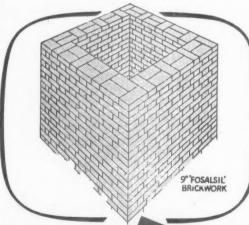
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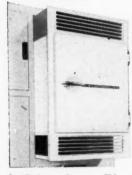
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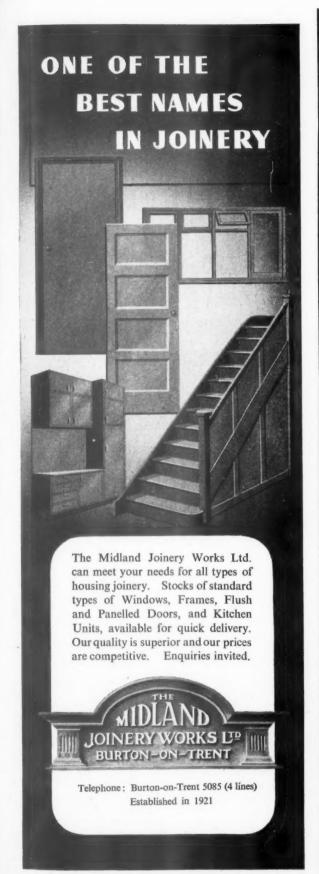
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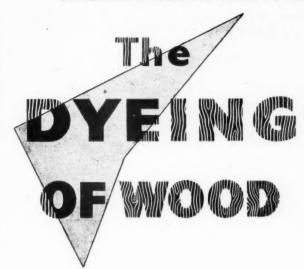
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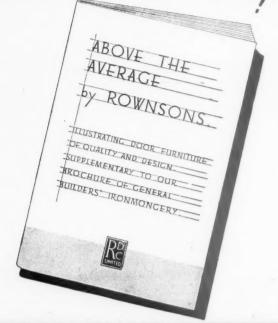
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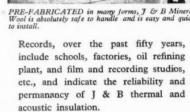
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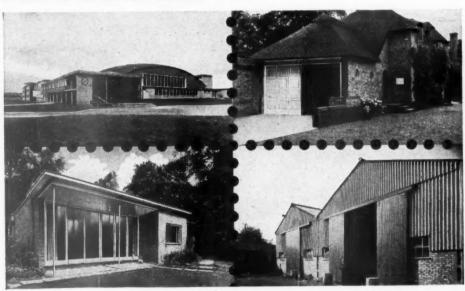
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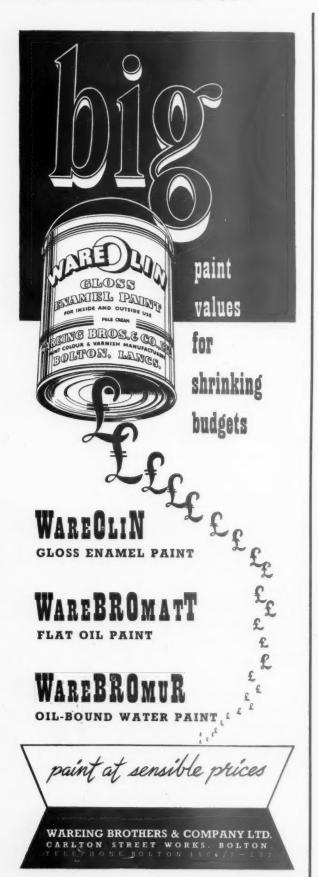
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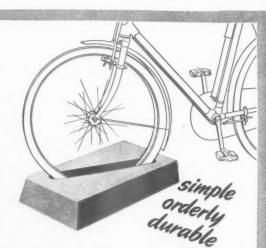
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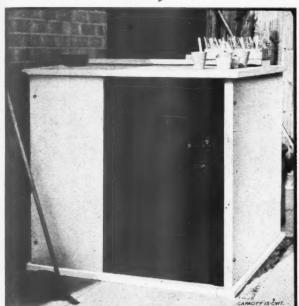
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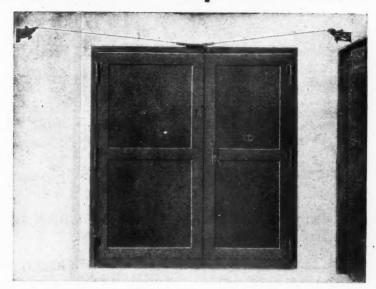
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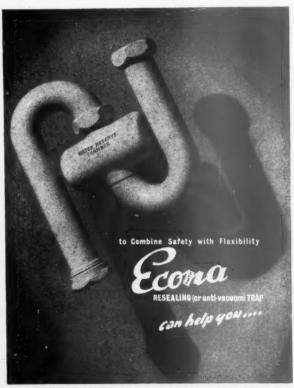
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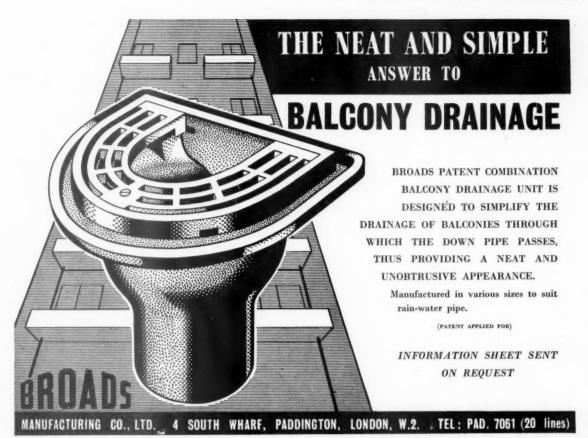
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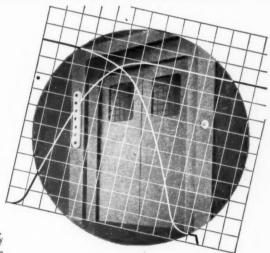
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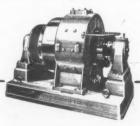
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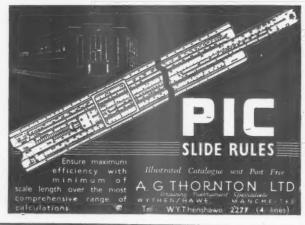
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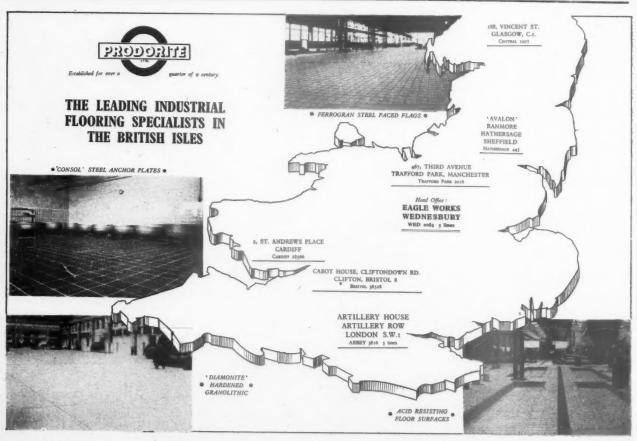
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A.P.T., Grade VIII—£785-£860 (as from 1st
January, 1955, this will be amended to provide
a salary scale of £750-£900). Applicants should be
particularly interested in contemporary design.
Application forms to be returned by 19th October,
1954, obtainable from the County Architect, P.O.
Box 26, County Hall, Preston.

BASILDON DEVELOPMENT CORPORATION.
Applications are invited for the following posts on the staff of the Chief Architect/Planner, Noel Tweddell, A.B.I.B.A.:—

(a) Grade III ARCHITECT. Salary: £860-£1,110

Tweddell, A.R.I.B.A.:—

(a) Grade III ARCHITECT. Salary: £860-£1,110 per annum.

(b) Grade IVB ASSISTANT ARCHITECTS. Salary: £760-£860 per annum.

(c) Grade IVA ASSISTANT ARCHITECT. Salary: £760-£860 per annum.

(c) Grade IVA ASSISTANT ARCHITECT. Salary: £660-£760 per annum.

The successful applicant for post (a) will be required to take charge of a Housing Group, and must have considerable experience in the design and supervision of large housing contracts and all stages of contract management to completion of final accounts.

One applicant for post (b) will be selected to work in a Housing Group, and must have experience in contemporary house design, preparation of working drawings and supervision of contracts, and another applicant will be selected to work in the Industrial Section, and must have experience in the design of small and medium size contemporary factories, preparation of working drawings, and the supervision of contracts.

The successful applicant for post (c) will work in a Housing Group, and must have experience in contemporary house design, preparation of working drawings and supervision of contracts.

All applicants must have a professional qualification in Architecture.

The commencing salary within each grade will be in accordance with experience and ability. All appointments are subject to the provisions of the Local Government and Other Officers' Superannuation Act, and medical examination.

House accommodation in the New Town may be available.

Applications must be made on the special form (obtainable from the Chief Architect) to the

be available.

Applications must be made on the special form (obtainable from the Chief Architect) to the General Manager, Basildon Development Corporation, Gifford House, Basildon, Essex, by 20th October, 1964, and the envelope endorsed with the relevant appointment.

COUNTY BOROUGH OF SOUTH SHIELDS.
ASSISTANT ARCHITECTS.
Applications are invited for appointments as
ASSISTANT ARCHITECTS in the Borough
Engineer's Department at a salary up to A.P.T.
Grade VI—£996/£760, according to qualifications

and experience.

The appointments will be terminable by one month's notice on either side and the successful candidate will be required to pass a medical examination for Superannuation purposes.

Housing accommodation will be made available if required.

Application forme quoting T.C.1 obtainable from the Borough Engineer, Town Hall, Scuth Shields, to be returned to him not later than noon, Monday, 18th October, 1954.

HAROLD AYREY.

Town Clerk.

CANNOCK URBAN DISTRICT COUNCIL.

(Population—41,230 (est.))

Applications are invited for the following appointment in the Architect's Department:—
QUANTITY SURVEYOR. Salary within Grades
A.P.T., VIII (£785-£360), and A.P.T., IX (£346-£960).

960). A.R.I.C.S., required to take charge of Section o enable junior officers to take qualifying ex-

A.B.I.C.S., required to take qualifying exto enable junior officers to take qualifying examinations.
HOUSING ACCOMMODATION AVAILABLE
for married candidates.
Further particulars and forms of application
are available from the undersigned.
Closing date: 25th October, 1954.
W. C. SPEEDY,
Clerk of the Council,
Sth October, 1954.
NORFOLK COUNTY COUNCIL.

Council House, The Green, Cannock, Staffs.

5th October, 1954.

NORFOLK COUNTY COUNCIL.

COUNTY ARCHITECT'S DEPARTMENT.

Required on established staff:—

(a) ARCHITECTURAL ASSISTANT A.P.T.

Grade V (£620—£670 p.a.).

(b) ASSISTANT QUANTITY SURVEYOR.

A.P.T. Grade II (£520—£565 p.a.).

(c) ARCHITECTURAL DRAUGHTSMAN (£395 p.a.).

N.J.C. service conditions; each post pensionable subject to medical examination.

Applications stating age, details of training experience, past and present appointments and salary, with names of three persons to whom reference may be made, to reach the County Architect, 27, Thorpe Road, Norwich, not later than October 23rd, 1954.

COUNTY BOROUGH OF WEST HARTLEPOOL.

BOROUGH ARCHITECT'S DEPARTMENT.

APPOINTMENT OF ASSISTANT ARCHITECT GRADE A.P.T. VI.

Assistant Architect in the Borough Architect's Department on Grade A.P.T. VI (£995 × 20 × 20 × 25 to £760).

The appointment is subject to the Scheme of Conditions of Service of the National Joint

Department on Grade A.P.T. VI (1995 × 20 × 20 × 25 × 25 to 2760).

The appointment is subject to the Scheme of Conditions of Service of the National Joint Council for Local Authorities' Administrative, Technical and Clerical Services and the Local Government Superannuation Acts, 1937-1953. The successful candidate will be required to pass a medical examination.

Applications giving full particulars of experience, together with copies of not more than three testimonials, should be addressed to the Borough Architect, Municipal Buildings, West Hartlepool, and be received by him, not later than Friday, the 29th October, 1954.

The Council is prepared to provide housing accommodation in connection with this appointment, if required.

ERIC J. WAGGOTT, Town Clerk.

Town Clerk's Department,
West Hartlepool.
29th September, 1954.

CITY OF SHEFFIELD.
CITY ARCHITECT'S DEPARTMENT.
APPOINTMENT OF SENIOR ASSISTANT
ARCHITECT (HOUSING) GRADE VIII.
Salary 2785 to £860 per annum (from 1/1/55 will be assimilated to new Grade V rising to £900). Superannuable post subject to medical examination and N.J.C. Conditions of Service.
Applications are invited from suitably qualified persons for the above mentioned appointment on the staff of the City Architect (Mr. J. L. Womersley, A.R.I.B.A., A.M.T.P.I.).
The person appointed will be required to prepare initial designs for housing layouts and to work them up in detail. Preference will be given to those having a planning qualification or with a particular interest in town planning, the grouping of buildings and landscaping.
The City's Housing Programme consists of (i) estates in outer areas comprising mixed development of houses and flats, (ii) estates in inner areas containing a substantial proportion of high flats, and (iii) the redevelopment of houses and flats, (ii) estates in inner areas containing a substantial proportion of high flats, and (iii) the redevelopment of houses and flats, (ii) estates in inner areas containing a substantial proportion of high flats, and (iii) the redevelopment of outworn central areas. The appointment offers considerable scope to progressive architects possessing the requisite qualifications, design ability and experience.

experience.
Applications stating age, education and training, qualifications, present and past appointments (with dates and salaries), experience, and the names of two referees, should reach me by the 25th October, 1954.

JOHN HEYS. Town Clerk.

Town Hall,
Sheffield, 1.
7th October, 1954.

COUNTY BOROUGH OF WALLASEY.
Applications are invited by 25th October, 1954,
for the following posts in the Borough Architect's Department:—
(a) QUANTITY SURVEYING ASSISTANT,
Grade A.P.T., VII, (£735-£819).
(b) ARCHITECTURAL ASSISTANT, Grade A.P.T., VII, (£755-£819).
(c) ARCHITECTURAL ASSISTANT, Grade A.P.T., II (£520-£555).
Forms of application obtainable from the Borough Architect, Town Hall, Wallasey, to whom they should be returned. The Council will favourably consider the provision of housing accommodation in connection with these appointments in approved cases.

A. G. HARRISON,

A. G. HARRISON, Town Clerk.

CORPORATION OF GLASGOW.

ARCHITECTURAL AND PLANNING
DEPARTMENT.

ASSISTANT ARCHITECTS.
ASSISTANT AUGUNTITY SURVEYORS
PLANNING ASSISTANTS

Applications are invited from persons having general experience and holding the A.R.I.B.A. or A.R.I.C.S., or A.M.T.P.I., qualification or equivalent. Scale £320-£870 with placing according to age and experience. Posts are superannuable, subject to medical examination. Form of Application may be obtained from the Principal Administrative Officer, 20, Trongate, Glasgow, C.1.

A. G. JURY, City Architect and Planning Officer

City Architect and Planning Officer.

CIVIL SERVICE.

QUANTITY SURVEYORS and ASSISTANT QUANTITY SURVEYORS are described by a control of the c

architect's omic, and standard.

Salary £400 to £640 per annum. Starting pay according to age and experience. Prospects of promotion and permanency.

Write: W.G.10/CA8(E), Ministry of Works, Abell House, John Islip Street, London, S.W.I.

4313

COUNTY BOROUGH OF OLDHAM.
APPOINTMENT OF ARCHITECTURAL
ASSISTANTS.
Applications are invited for the following appointments in my Department:—
(1) Architectural Assistant at a salary in accordance with Grade A.P.T. V (£620—£670 per annum).

ance with Grade A.P.T. V (£620-£670 per annum).

(2) Junior Architectural Assistant at a salary in accordance with Grades A.P.T. II, III or IV, according to qualifications.

Applicants for the first appointment should be Registered Architects, and in both cases Housing Accommodation will be provided if necessary. The appointments will be subject to the Superannuation Acts and the successful candidates will be required to pass a medical examination.

Applications giving age and previous appointments, in addition to qualifications and experience, together with copies of two recent testimonials, must reach me not later than Monday, the 1st November, 1954, in envelopes endorsed "Architectural Assistant."

A.L. HOBSON.

Prevant Fequines and Surveyors

A. L. HOBSON,

Borough Engineer and Surveyor.

Oldham.

BOROUGH ARCHITECT'S DEPARTMENT.
SENIOR QUANTITY SURVEYOR, Grade
VIII.

Salary £785—£860 per annum. Qualifications: A.R.I.C.S. (Quantities)

Qualifications: A.K.I.U.S. Quantum similar. Permanent staff appointment, subject to one month's notice and pensionable subject to medical examination. National Conditions of Service. Form of application obtainable from and to be returned to the Borough Architect. The Council House, Derby, not later than 25th October, 1954. Canvassing disqualifies.

G. H. EMLYN JONES.

G. H. EMLYN JONES.

Town Clerk.
4222

30th September. 1954.

WILTSHIRE COUNTY COUNCIL invite applications from Registered Architects for superannuable post of ASSISTANT ARCHITECT. Salary: £620-£670. Application forms obtainable from County Architect. County Hall, Trowbridge, returnable within 14 days of the appearance of this advertisement.

P. A. SELBORNE STRINGER,

Clerk of the County Council.

4285

CITY OF NEW SARUM.

SENIOR ARCHITECTURAL ASSISTANT required in City Engineer's Department. Salary within range Grade Va. £650-£710 (revised 1st January, 1955, £675-£725).

Aoplicants must possess Final R.I.B.A. or equivalent. and have had experience in design and detailing of housing schemes, estate layouts and public buildings, and in the supervision and handling of contracts.

Pensionable post. Medical examination required. Housing accommodation provided.

Applications, stating age, present and previous appointments with salaries with the names of two referees, to the City Engineer. The Council House, Bourne Hill, Salisbury, by 24th October. Canvassing will disqualify.

4288

METROPOLITAN BOROUGH OF CAMBERWELL.

METROPOLITAN BOROUGH OF
DEPARTMENT OF DIRECTOR OF HOUSING
AND BOROUGH ARCHITECT.
(a) SENIOR ASSISTANT ARCHITECT.
National Scale. A.P.T. VIII (1815—2890 inclusive of £30 London weighting); (b) ASSISTANT
ARCHITECT A.P.T. VIII (£560—5790 inclusive);
(c) JUNIOR ARCHITECT A.P.T. III/IV (£580—2655 inclusive). Scales subject to review 1st
January next. Qualification required for first two
posts A.R.I.B.A.; for junior architect, R.I.B.A.
Intermediate Examination or its equivalent with
a minimum of one year in an architectural office.
Work of department includes design and construction of public buildings, housing estates,
including multi-storey construction. No housing
provided. Superannuation scheme. Application
form Town Clerk, Town Hall, S.E.5. Clesing
date, 5th November. 4268

date, 6th November.

COUNTY BOROUGH OF BLACKPOOL.
TECHNICAL COLLEGE AND SCHOOL OF ART.
Required:—Full-time TEACHER OF ARCHITECTURE to R.I.B.A. Final standard. Listed
School for external examinations of the Institute.
Applicants should be A.R.I.B.A. or equivalent.
Salary—Burnham Award, 1954 (Assistants Grade
"A"). Application forms and further particulars
from the Chief Education Officer, Stanley Buildings, Blackpool.

TREVOR T. JONES.

TREVOR T. JONES, Town Clerk

BOROUGH OF ROYAL TUNBRIDGE WELLS.
ARCHITECTURAL DRAUGHTSMAN.
Applications are invited for the above appointment. Applicants must have had previous experience, and should not be under 20 years of age.
Salary in accordance with the General Division of the National Scales.
Applications in writing, giving the names of two referees, must be submitted to the undersigned not later than 20th October, 1954.

M. J. H. GIRLING,
Town Clerk.

Town Hall, Tunbridge Wells.

Town Hall, Tunbridge Wells.
October, 1954.
LONDON COUNTY COUNCIL.
Grade III ENGINEERS (salary up to £892 10s.)
and SURVEYING ASSISTANTS (up to £739 10s.)
required in District Surveyor's Service, Qualifications A.R.I.B.A., A.M.I.Str.R., or A.R.I.C.S.;
structural knowledge essential. Particulars and
application forms from Architect (AR/EK/DS/2),
County Hall, S.E.I., (1025).
BRITISH ELECTRICITY AUTHORITY.
SOUTHERN DIVISION.
Applications are invited for the following
positions:—

positions:—
SENIOR ENGINEERING DRAUGHTSMAN
(CIVIL AND BUILDING), Construction Depart-

(CIVIL AND BUILDING), Construction Department.

Applicants should have had experience of design and detailing of either industrial buildings, or structural steelwork, or reinforced concrete structures and piled and slab foundations for heavy plant, or drainage and sanitation schemes.

Candidates should have a good technical education in either mechanical or electrical engineering or in architecture and building construction.

Salary N.J.B. Grade D.5. £657—£671.

GENERAL ASSISTANT ENGINEER (BUILD-INGS), Construction Department.

Applicants should possess an Intermediate R.I.C.S. (Quantities Sub-Division) or H.N.C. (Buildings). Experience in the preparation of bills of quantities and specifications is necessary, and candidates should be able to supervise the measurement of building and civil engineering works.

works.
Salary N.J.B. AX/CX.8. £501—£675.
Special application forms for each of the above positions, obtainable from P. D. A. OLIVER. Divisional Secretary, 111. High Street, Portsmouth, should be returned by 20th October. Please quote ref. A.J. 4256.

quote ref. A.J. 4256.

NATIONAL COAL BOARD—NORTH EASTERN DIVISION.

Applications are invited for the following appointments to the staff of the Divisional Chief Architect at Denaby Main, near Doncaster:—

1. ARCHITECTURAL ASSISTANT, Grade II. Scale: 440 × £20 to £540 per annum.

Applicants should have passed the Intermediate Examination of the Royal Institute of British Architects, and have had some subsequent practical experience, and should be able to prepare sketch plans and working drawings under supervision and have a sound knowledge of building construction.

sketch plans and working drawings under supervision and have a sound knowledge of building construction.

The point of entry into this Grade will depend upon qualifications and experience.

2. JUNIOR ARCHITECTURAL ASSISTANT. Scale: £2 17s. 6d. per week at 15 years of age rising to £8 per week at 25 years of age, according to age.

Apolicants should have obtained their General Certificate of Education in sufficient subjects to enable them to proceed with the Intermediate examination of the Royal Institute of British Architects, and should preferably be studying for such examination.

The work of the office consists chiefly of Pithead Baths, Canteens, Medical Centres, Offices, Laboratories, etc.

Application forms may be obtained from the Divisional Chief Architect. J. A. Dempster, F.R.I.B.A. Architect's Department. National Coal Board, P.O. Box No. 4. Denaby Main, Doncaster, and when completed should be returned not later than the 18th October, 1954.

4238

COUNTY BOROUGH OF GATESHEAD BOROUGH SURVEYOR'S DEPARTMENT, ARCHITECTURAL SECTION. (a) ASSISTANT ARCHITECTS: Grade A.P.T. VI

(£695—£760). (b) JUNIOR ARCHITECTURAL ASSISTANTS: Grade A.P.T. II to IV (£520—£625) accord.

(c) JUNIOR QUANTITY SURVEYING ASSISTANT: Grade A.P.T. I or II (£490/£535 or £520/£565).

April 2501/2555).

Applicants for (a) must be Registered Architects, Corporate Members of the R.I.B.A., and experienced in design and construction of Public Buildings, Schools and/or Municipal Housing.

(b) Should have had previous experience in an Architect's Office and must have passed the R.I.B.A. Intermediate Examination.

(c) Should have passed or be studying for the Intermediate Examination of the R.I.C.S. or the I.Q.S., be not less than 21 years of age, and have had previous experience of Quantity Surveying, including measuring up on site.

The appointments are established, pensionable, subject to Medical Examination, prescribed conditions and Local Government Superannuation Acts.

Acts.

Application forms from Mr. G. F. Winters,
B.E., A.M.I.C.E., Borough Surveyor, Municipal
Buildings, Swinburne Street, Gateshead, 8, returnable by 1st November, 1954. Canvassing disqualifies.

C. D. JACKSON, Town Clerk,

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Town Hall, Gateshead, 8. 2nd October, 1954

CARD October, 1954.

GLOUCESTERSHIRE COUNTY COUNCIL.
ASSISTANT ARCHITECTS, qualified Members of R.I.B.A., Grade V (£620-£570), and also ARCHITECTURAL ASSISTANTS, Grade IV (£580-£625), Inter. R.I.B.A., and have worked in an Architectural office for a period of two years. N.J.C. Conditions of Service. Medical examination. Motor car driving licence.

Apply, giving age, present position, salary, and date of appointment, previous appointments, names and addresses of two persons for references, County Architect, Shire Hall, Gloucester, by 21st October, 1954.

GUY H. DAVIS, Clerk of the County Council. 4292

DERBYSHIRE COUNTY COUNCIL.
COUNTY ARCHITECT'S DEPARTMENT.
Applications are invited from Architects for appointments on A.P.T. Grades VI and III.
N.J.C. conditions. Details of the various appointments will be sent with application forms, to be obtained from: F. Hamer Crossley, St. Mary's Gate, Derby.

4261

Gate, Derby.

ROXBURGH COUNTY COUNCIL.

ROXBURGH COUNTY COUNCIL.

COUNTY ARCHITECT'S DEPARTMENT.

Applications are invited for the appointment of ASSISTANT ARCHITECT.

Salary scale £650-£770 per annum (grades V to VI) with placing within that scale according to qualifications and experience.

Candidates must be registered architects, and preferably Members of the Royal Institute of British Architects.

Candidates must be registered architects, and preferably Members of the Royal Institute of British Architects.

The appointment is subject to the Local Government Superannuation (Scotland) Act, 1937, and to satisfactory medical examination. Applications, accompanied by one copy each of three recent testimonials should be lodged with the undersigned not later than 25rd October, 1954.

1954. Canvassing, directly or indirectly, in connection with the appointment will disqualify.

JAMES R. HUME,

County Clerk.

County Offices, Newtown St. Boswells. 30th September, 1954.

WARWICKSHIRE COUNTY COUNCIL.
Applications are invited for the following

Applications are invited to the appointments:—
(1) SENIOR ASSISTANT ARCHITECT (£735-

£210).

Applicants should be Members of the Royal Institute of British Architects and have had experience in the design and construction of large buildings. Experience in non-traditional forms of construction will be an advantage.

(2) ARCHITECTURAL ASSISTANT (£550—£15

construction will be an absolute construction will be a way and the construction of the Royal Institute of British Architects and have some practical experience.

(3) CLERK OF WORKS (£550-£15-£595). Applicants must have a good knowledge of all building trades, be able to write reports, specifications and be capable of maintaining existing County Buildings along with the supervision of new works. Applicants must be able to drive a car, which will be provided by the Council.

The appointments are on the established staff and will be subject to the provisions of the Local Government Superannuation Acts 1937-53 and the successful applicants will be required to submit a satisfactory medical certificate.

Applications to be made on a form which can be obtained from G. R. BARESLEY, F.R.I.B.A.. County Architect, Shire Hall, Warwick, to whom they are returnable by October 25th. 1954.

E. EDGAR STEPHENS.

Clerk of the Council.

Shire Hall, Warwick. 1st October, 1954.

COUNTY COUNCIL OF THE WEST RIDING OF YORKSHIRE.

OFFICE OF THE COUNTY ARCHITECT.

Applications are invited for the following

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ANTS. ASSIS-490/£538

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Applications are invited for the following appointments:—

ASSISTANT ARCHITECTS—Grades A.P.T. V. V. and VI. Salary ranges (V) £620—£700. (Va) £650—£700 and (VI) £695—£760. Applicants should be Registered Architects and preferably be associate Members of the Royal Institute of British Architects and have had extensive experience in the maintenance and repair of buildings and minor adaptations thereto. The vacancies are for both the Wakefield and Harrogate offices.

The appointments are subject to the provisions of the Local Government Superannuation Act 1937, as amended by the W.R.C.C. (General Powers) Act, 1948, and the Conditions of Service at present in operation by the County Council. The successful candidates will be required to pass a medical examination.

Applications, on forms obtainable at this office, should be delivered not later than the first post on Monday, the 25th October, 1954.

HUBERT BENNETT, F.R.I.B.A.,

County Architect.

CITY OF BIRMINGHAM.
CITY ARCHITECT'S DEPARTMENT.
APPOINTMENT OF ASSISTANT ARCHITECTS.
Schools Section —

CITY ARCHITECT'S DEPARTMENT.
APPOINTMENT OF ASSISTANT ARCHITECTS.
Schools Section.—

(a) SENIOR ASSISTANT ARCHITECT—Grade
A.P.T. IX (£840/£960 per annum).

(b) SENIOR ASSISTANT ARCHITECT—Grade A.P.T. VIII (£785/£60 per annum).

Housing and General Section.—

(c) ASSISTANT ARCHITECT—Grade A.P.T.

VII (£735/£810 per annum).

The Department is carrying out a large major School Building Programme and for (a) and (b) the successful candidates will be required to have an extensive knowledge of the planning, design and erection of all types of school buildings in both traditional and non-traditional construction.

Applicants must be Associate Members of the R.I.B.A., or hold an equivalent qualification.

The posts are permanent, superannuable, subject to a medical examination and to one month's notice on either side.

Applications, endorsed with the heading of the post, stating age, present position and salary, qualifications and experience, together with the names of two persons to whom reference can be made, should reach the undersigned not later than 22nd October, 1954.

Canvassing disqualifies.

A. G. SHEPPARD FIDLER,

City Architect.

Civic Centre, Birmingham, 1.

PUBLIC SERVICE OF SOUTH AUSTRALIA.
Applications are invited for positions of ARCHITECT. QUANTITY SURVEYOR and SPECIFICATION WRITER in the South Australian Public

Service.

The following qualifications are required:—
For Architects.—Registration as an architect or
membership of a recognised institute of architects.
For Quantity Surveyors.—Membership of a recognised institute of quantity surveyors.
For Specification Writers.—A thorough knowledge of building construction and the ability to
prepare architectural specifications for major
public works.

For Specification writers.—A thorough knowledge of building construction and the ability to prepare architectural specifications for major public works.

Salaries range as follows:—

Architects.—From A£957 per annum to a maximum of A£1,277 per annum, with prospects of advancement.

Quantity Surveyors.—From A£957 to a maximum of A£1,277 per annum.

Specification Writers.—From A£732 per annum to a maximum of A£1,147 per annum.

The commencing salary and maximum salary will be determined in accordance with the appointee's qualifications and experience.

Further particulars may be obtained from the Agent General & Trade Commissioner for South Australia, South Australia House, Marble Arch.

W.1.

Australia, South Australia, W.I.

CITY ARCHITECT'S DEPARTMENT,
EDINBURGH.
ASSISTANT ARCHITECTS required at salaries up to 4720 per annum, depending upon experience. Applications giving age, qualifications and full details of experience should be delivered to the undersigned as soon as possible after the appearance of this advertisement.

A. STEELE.
City Architect.
4233

City Chambers, Edinburgh, 1.

SPALDING RURAL DISTRICT COUNCIL.
APPOINTMENT OF TECHNICAL ASSISTANT

—RCHITECT'S DEPARTMENT.

Applications are invited from persons having a sound and practical knowledge of architectural and onantity surveying work for the above appointment. Salary to be within A.P.T. Division IV of National Scale (£580—£625 p.a.).

Appointment subject to the Local Government Superannuation Act, 1937, and to a satisfactory medical examination. Canvassing will disqualify. The Council are prepared to let a house in the Rural District to the successful applicant.

Applications giving the names of three persons to whom reference may be made to reach the Clerk to the Council, Rural Council Offices, Spalding, not later than 21st October, 1954.

4324

Architectural Appointments Vacant
4 tines or under, 7c. od.; each additional tine, 2s.
The engagement of persons answering these
advertisements must be made through a Local
Office of the Ministry of Labour or a Scheduied
Employment Agency if the applicant is a man
aged 18-64 inclusive or a woman aged 18-69
inclusive unless he or she or the employment is
excepted from the provisions of the Notification
of Vacancies Order, 1952.

REQUIRED for Architects' office, Central
Interested in design and construction. Write, stating experience and salary required. Box 2336.

JUNIOR and SENIOR ARCHITECTURAL
ASSISTANTS and DRAUGHTEMEN for
large and varied practice in Home Counties.
Salary required and details of experience to Box
3512.

A RCHITECTURAL ASSISTANT required.

A CHITTECTURAL ASSISTANT required in Old Established expanding busy country practice. Office experience essential. £500 p.a. or according to ability. Write Box 4129.

A SSISTANT for Plymouth, with office experience Quick draughtsman, capable preparing working drawings and details for industrial and domestic work. Salary in region of £500, according to experience. Reply, quoting salary, to Box 4151.

ing to experience. Reply, quoting salary, to Box 4151.

PUILDING SURVEYING ASSISTANT (about R.I.C.S. Final Standard) with at least two years' practical experience required by City firm of Chartered Surveyors & Architects.

A RCHITECTURAL ASSISTANTS and BUILD-A ING DRAUGHTSMEN required. Replies in confidence, giving age and salary, to W. L. Jones, Architect, Great Missenden, Bucks. 4164

A RCHITECTURAL SENIOR EXECUTIVE wanted as Projects Manager by large Building Contractors operating in various centres in the United Kingdom for promoting immediately the design and erection of modern multi-storey blocks of flats. Experienced, energetic, and forward-looking man who can collaborate with top grade architects and get work moving quickly. Only high level applicants with relevant experience considered. Apply with full particulars to Box 4211.

RCHITECTURAL ASSISTANT required for

ence considered. Apply with full particulars to Box 4211.

A RCHITECTURAL ASSISTANT required for central London office experienced in the preparation of working and detailed drawings for large commercial buildings and shop work. Applicant should be at least up to Intermediate A.R.I.B.A. standard, and must be a quick and neat draughtsman, able to work under own initiative. Salary according to qualifications and experience. Five-day week. Apply, stating age and experience, to Box 4171.

A RCHITECTURAL ASSISTANTS required, one Senior, qualified and experienced, and one Intermediate stage, for busy West End office engaged on commercial work. Five-day week. Reply, stating qualifications, experience, age, and salary required, to Box 4158.

E XPERIENCED SENIOR and JUNIOR ARCHITECTURAL ASSISTANTS required, preferably with experience in industrial work. Write or telephone to Hasker & Hall, Architects, 13, Welbeck Street, London, W.1. Welbeck 0061.

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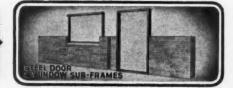


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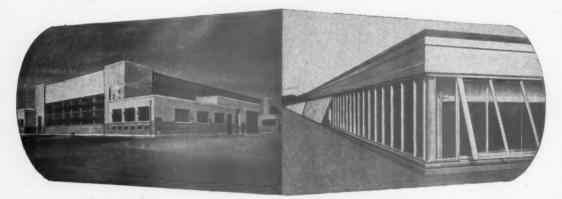
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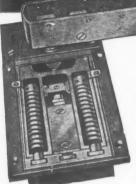
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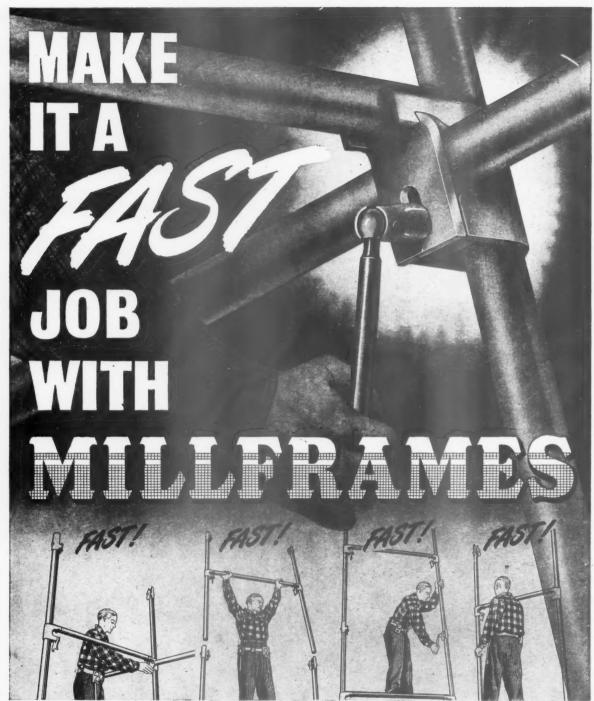
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