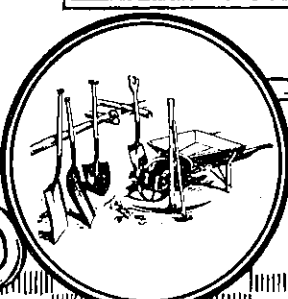
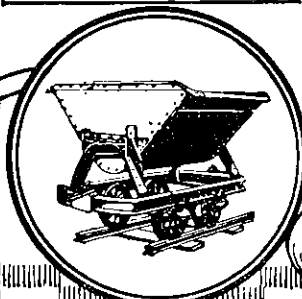
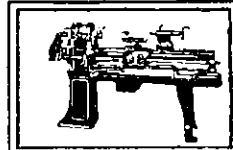
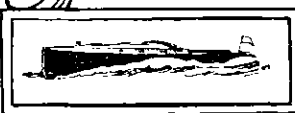
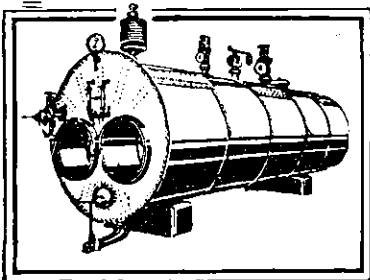
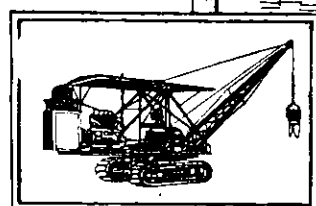
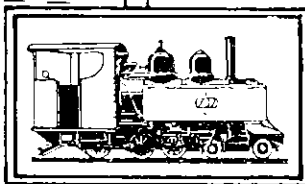
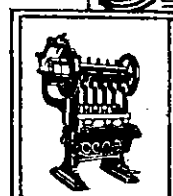


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BUILDING CONTROL ABOLISHED.

Much to the relief of the community generally, the Board of Trade has relinquished its control over building operations. It has been urged to do so on many occasions by the New Zealand Institute of Architects, which brought many effective arguments to bear on officialdom, but was always over-ridden by the demand for workmen's dwellings, and the keen sympathy of Parliament with the Government's desire to overtake, to some extent, the great shortage which had arisen through the lack of materials. Government control over any industry always causes inconvenience and loss in quarters which have no right to suffer, and it was so in the case of the building regulations. They actually added to the already high cost of operations by the increased amount of preliminary work which had to be done before any contract could be let. The deciding factor in removing control was no doubt the increased supply of building materials, and their reduced cost. The scarcity of dwellings continues, but the Government, in removing control before this has been overtaken, tacitly admits that no amount of officialdom interference and issue of "permits" can dispose of economic factors. Dwellings would be built if there was a prospect of a fair return from letting, but while the tenants' protective legislation remains in force enterprise is likely to be restricted in this sphere. We notice that during the recent short session, when the housing question was one of the many urgent matters brought under the notice of the Government—the average Member of Parliament has a wonderful faith in the efficacy of a question to a Minister that the Prime Minister plainly indicated the necessity for amendment of the law so as to make it less one-sided. He is of opinion that protection is needed, not only for tenants who deserve it, but for landlords who have been exploited by unscrupulous tenants who come under the shelteringegis of the war legislation.

RESULTS OF CONTROL.

Looking back over the events of the past few years it is difficult to find that official control

over building has materially relieved the housing shortage. It failed to deal with the problem squarely, because it did not overcome the financial handicap placed on the construction of houses for rent. What degree of preference was given to dwellings over picture theatres and racecourse grandstands was in favour of the owner who built for his own occupation, almost regardless of expense. The proposal to group a few big firms for large-scale building of workers' dwellings came to no definite result, and no doubt the arguments placed before the Minister of Labour by the Institute of Architects had some influence on the Government's failure to take up the scheme. "The position," stated the Secretary of the Institute in his letter to Sir William Herries, "is not going to be improved by eliminating from the market a large number of the smaller firms who are habitually engaged in house building, and who are really the most efficient house builders, and giving all the work to larger firms which have a limited or past experience of this branch of building."

Persons who wish to build for themselves should be encouraged in every way, for a great number of those who want houses to-day are people who desire something better than the ordinary workman's home, and who are prepared to build for themselves if they can get the material. Indeed, this class of person in Great Britain is actually assisted with a building bonus from the Government. Our Government could reasonably do the same, or advance money at low rates of interest, and on a narrow margin of security. Our Wanganui Branch points out that of 40 builders who are erecting houses in that town, not one is putting up the cheap class of house which is required for the manual labourer, simply because houses of that description do not pay, and only about six are engaged in work other than house building. It would appear from the information we have available, that a similar position exists in many other towns. In any schemes adopted for execution by the Government or by municipalities, special attention should be paid to the needs of the lowest paid class of workers, regardless of whether they are manual or other workers. All houses built under

such conditions should be for letting only, no sales of any kind being permitted."

THE FALL IN PRICES.

Since we last discussed the position of the building trade some substantial reductions have taken place in important lines of materials, imported and otherwise. Had the financial position remained favourable to enterprise, the building industry would now be on the eve of a real boom, for there is an immense amount of leeway to be made up in all classes of buildings. Unfortunately, money has become scarce, and the interest rates are rising steadily, despite all the efforts of the Government to keep them down. The money market is in such a condition that wild-cat speculations, whether in building or in the serious over-trading which has been going on in this country, have been effectively checked. The way is being paved for a return to reasonable conditions of trade, and although the path is rough and uncomfortable, it seems inevitable that it must be trodden; and the business community, by facing it with courage and determination, will get through with credit and success. The ominous word "slump" has been heard throughout the world, and New Zealand can scarcely fail to experience something of that phenomenon as a result of the fall in the prices of its leading export products, but the Dominion is so constituted as a producing community that it should feel the evil of slump less in proportion than any other country in the world. It must not be overlooked that during the last six or seven years, the values of New Zealand exports have been at record height. This has resulted in the accumulation of many millions which were not spent, possibly owing to the fact that it was difficult to import. This splendid reserve of credit, the Government's share of which is represented by something like twenty millions sterling of accumulated surpluses, has not disappeared, though we admit that much of it has recently been pledged to carry us over hard times. The soundness of New Zealand's economic position comes from the fact that the community contains very few drones. We have no large class living on interest—the great majority of our capitalists are themselves hard workers—so that all energies are being directed to useful production, not of luxuries, which can be done without in times of stress, but of food necessities, for which there is always a market, though, as the farmer will dismally remark, "at a price!" Hard work will pull us through with flying colours.

ANOTHER MORATORIUM.

The recent short session, though not specially called for the purpose of dealing with the questions of deposits and other special contracts, came at a very opportune time to secure the passage of important legislation which has the effect of widening the scope of the principle of the moratorium, so as to cover deposits with institutions other than

banks and the savings banks. Had this legislation not been passed there is reason to believe that some large institutions, absolutely sound financially, would have been forced into liquidation owing to the fact that they had borrowed large sums on short call, for the purpose of lending to clients on longer terms on the security of a mortgage. The borrower on mortgage being protected by the war legislation against foreclosure, could not be forced to pay when the mortgage became due, but the scarcity of credit was preventing the usual stream of deposits flowing through the ordinary channels. Having protected one class, the Government was obliged to go further, and give some security for the deposit companies against difficulties arising from the moratorium, and the result was an amendment of the Mortgages Extension Act, passed in one sitting through both Houses, enabling holders of short call money to hold it until May 31st, and longer if they give notice to the lender that the money is further wanted. The renewal of the deposit is, however, subject to the payment of at least one per cent. additional interest. If this legislation is very generally acted upon, it will result in an automatic rise of at least one per cent. in interest, and the effect is sure to be felt in the rates of interest on ordinary mortgages. This section applies only to contracts of deposit which existed on the passing of the Act, viz., March 21st last. It was made quite clear during the discussion on the measure that it applies to building societies, which have large sums on deposit. There was a good deal of relief in certain commercial circles when the Act was passed, and the indications point to the fact that the financial tension has lessened as a result. We hear of some firms with deposit money who do not propose to take advantage of the measure. This will give confidence to the investor. Where the holding up of a deposit is likely to cause hardship, the depositor can at once proceed through the Supreme Court to secure an order for its repayment. The proceedings are to be in Chambers, so that there will be no publication of the circumstances which may make it necessary for the depositor to have prompt recourse to his deposit. We should imagine also that in case the depositor proved that he had a reasonable case for repayment, the Judge would order costs against the institution which had refused to accept his arguments privately, and had forced the depositor into Court. During the same session the Minister of Finance had to take power to authorise the payment, by local bodies, of a higher rate of interest than they have hitherto paid on their debentures. The former rate of $5\frac{1}{2}$ per cent. is out of the question, and efforts to secure money outside New Zealand have only succeeded by offering the investor $6\frac{1}{2}$ per cent. on this fine class of security. Some of the local bodies' financial requirements for electric reticulation must be met speedily, otherwise the State's hydro-electric developments, which we are glad to note are continuing with vigour, will have no profitable outlet.

Building Guilds.

The Building Guild that was to be formed in Wellington by the disappointed carpenters whose pay was reduced to 2s. 9d. per hour recently by the Wellington master builders is still in the embryo stage of development. The "Guild" idea is being tried out in England at the present time, and the Walthamstow Urban District Council has let a contract to the Guild of Builders (London), Limited, for 400 houses estimated to cost £400,000, which experiment will be watched with the keenest interest. In a recent article, "Solving Housing in England," Mr. Malcolm Sparkes says:—

"Amid all the tremendous chaos of the present industrial situation, the rise of the Guild of Builders stands out clear-cut and strong, a great fact from which we can take courage. Planned by men who believe that it is far more important to build up a new system than to destroy the old, it is a deliberate attempt to establish here and now a serious instalment of that new industrial order for which everyone is looking. And with the signature of its first contract—the Walthamstow Housing Scheme—the curtain rings up on one of the most adventurous experiments of our time.

The Guild is based upon the National Federation of Building Trade Operatives, the London section of which embraces twelve trade unions with 60,000 men. As the Trade Union Ticket is the certificate of Guild membership, both Guild and Federation are really the same people, organised for different purposes. The Federation regulates industrial conditions; the Guild builds houses. The control in each case rests with the rank and file, and the whole structure is very simple and easily understood.

A guild is a self-governing democracy of organised public service, with the whole team pulling together for the common purpose. The time-honoured criticism that the workers cannot control industry because they know nothing about business disappears before the fact that the Guild of Builders includes in its ranks every type of building trade expert that there is, whether administrative, technical, or operative. Guild control is control by the people who do the work, instead of control by the people who put up the money. Every essential function in the industry is therefore represented on the Guild Committee.

THE OPERATIVE BRICKLAYERS' SOCIETY.

The Operative Bricklayers' Society elect their man, the carpenters and joiners theirs, the painters, plumbers, plasterers, masons, etc., theirs.

The committee thus constituted has power to approve other associations or groups of building trade workers, and this is how the technicians come in. Under this clause, the architects' and sur-

vveyors' groups have already elected their representative; a group of civil engineers is being formed; and a further group of decorative painters and sculptors is under consideration. Here, also, come the local Guild Committees. The Walthamstow Committee has a representative; Greenwich has another, and ten more are to follow.

From this it will be seen that the London Guild Committee will ultimately consist of some 25 to 30 members, about half of whom will be responsible to the craft unions or other approved functional organisations, and about half to the local Guild Committees. The London Guild Committee thus forms the legal entity. It has already been registered as "The Guild of Builders (London), Ltd." All committee men are directors, each holds one shilling share, and all are removable by their associations.

The labour of the guildsmen will not be treated as a mere commodity like bricks or timber, to be purchased as required and discarded when done with. When the financial arrangements are complete, pay will be continuous, in sickness or accident, in bad weather or in good. The word unemployment, as we used to understand it, is to be ruled out of the dictionary, let us hope, forever.

The contract just signed with the Walthamstow Urban District Council will probably be the model for many others. It creates a great triple alliance in which the Guild undertakes the whole of the work; the Co-operative Wholesale Society supplies the materials; and the Co-operative Insurance Society guarantees due performance of the contract—the liability under this head, however, being limited to one-fifth of the contract price. This price is the actual net prime cost of materials and labour at standard rates plus £40 per house to enable the Guild to guarantee a full week to each of its workers, and six per cent. on the estimated cost as given in the Guild tender. Payments are to begin at the end of the first week and to continue weekly, the cost of plant and administration being met out of the six per cent.

It is the size of the contract that makes the six per cent. fully sufficient for administration and equipment. The number of houses to be built at Walthamstow by the Guild is 400, and the estimated cost amounts to very nearly £400,000. It is anticipated that three per cent. of this sum would be more than sufficient to provide first-class equipment of every kind. Already the Guild has secured a splendid plant of wood-working machinery, most of which is being installed on the site. The payment for this and other equipment is made possible by an advance by the Co-operative Wholesale Society's bank, secure against payments falling due under the contract.

THESE 400 HOUSES.

These 400 houses only represent the first section of a much larger housing scheme for Walthamstow, but even by themselves they will make a very substantial contribution to the relief of the housing problem. The Walthamstow Guild Committee, which supplies the labour to the contract, is already overwhelmed with volunteers, and it is quite evident that the job will be fully manned, and the speed of its progress is only limited by the rate of delivery of materials. This is a problem that will not be satisfactorily solved until the Guild sets up an extensive organisation for manufacture and supply of every essential article for building. This, however, is only a matter of time. For preliminary expenses the Guild is raising a loan without interest, by the sale of loan receipts of five shillings and upwards, which are repayable at the

discretion of the directors from surplus earnings.

Although the payment of a limited rate of interest for the hire of capital is clearly permissible, it is a fundamental rule of the Guild constitution that surplus earnings can never be distributed as dividends but must always go to the improvement of the service, either by way of increased equipment or technical training and research. The Guild intends to build the best possible buildings at the lowest possible cost. It concentrates on this service every improvement in process or in method that science and skill can provide. It throws aside all class distinctions and boldly calls for volunteers from every grade of the industry, for men who will take risks gladly in the doing of one of the greatest tasks that has ever been attempted. It is a real, living, industrial comradeship of service.

Ethics of the Architectural Profession.

Being some extracts from a paper read before the Royal Architectural Institute of Canada.

BY MR. W. A. LANGTON.

[We publish these extracts because of their appropriateness to our New Zealand conditions. If the profession in this country would only uphold similar ideals there would be great hope for the rapid development of architecture here.—Editor.]

The first point, and the principal point, in the ethics of architectural practice is that the architect should be able to do the work he undertakes to do. He must fit himself to deserve the confidence that is placed in him. Most architects get the length of insisting that they be given the full confidence of their clients. They are always ready to exalt the architect. There are, no doubt, some who think that this Institute is intended to exalt the architect, to take care of his interest. It is not. This Institute and our provincial associations are intended to exalt the art and practice of architecture, to create high ideals of both in the minds of architects and so help them to better performance. These bodies are, therefore, really intended to take care of the interests of the clients of architects. There is no room for any other aim, for the practice of architecture is the service of clients. The architect must have not only no other aim which contradicts this, but he may give himself up wholeheartedly to this aim with the certainty that in it will be fulfilled all legitimate ends of his calling, art, honour, profit, and good-will to men.

It may be asked in connection with this. Is not the architect to think of his fee at all? In reply to this we must recognise that, though the carrying out of an architectural design is of so complicated a nature that the joy of performance can hardly obtain all through for the artist, as it does in

simpler arts which are executed by the artist's own hand, yet it is created; and the result, in their development and attainment, are an end in themselves and enough to absorb the mind of a real artist to the exclusion of thoughts of the reward. But the architect's mind, or the composite mind of a firm of architects, must include a grasp of the means of financing the expensive operation of producing good work. He must, for that reason, think of his fee. But the fact is that for nearly all kinds of services there is no occasion to think of it. The schedules of fees fixed by the associations are intended to make such thought unnecessary. They are arranged, so far as possible, to secure for all kinds of work a payment that will enable the architect to keep up the means of performing it properly.

If the provisions of the schedule prove to be insufficient, or an architect thinks he is entitled to more, he has a perfect right to fix a fee to suit his own ideas; and, indeed, he ought to do so. He cannot meet an insufficient fee by work to match. There is but one grade of professional work—the best; and it must be paid for. It must also be paid for by the client.

The latter consideration opens up another point of proper practice. It is not conducive to the proper practice of architecture, that is to say, to the true service of the client, that the architect should receive pay from any one but the client or should find pecuniary profit in building for clients in any other way than by direct payment from the client.

N.Z. Institute of Architects Annual Meeting

Held at Napier, 23th February, 1921.



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			G. A. J. Hart (Christchurch)	W. Gray Young (Wellington)			Wm. Fielding (Wellington)

He may not receive payment of any kind from any one who is concerned in the erection of the client's building, except the client himself.

Here arises another question, which is often raised by architects: How far is the client to be humoured in wishes which interfere with good design? This question deserves a paper to itself. The answer turns upon the question: What is good design? My own opinion is that, where the client's wishes have interfered with good design, the defect is to be referred to the designer. The problem set before the designer is the client's wishes. It is from these that he must make his design, not from his own preconceived notions embodying some architectural conception. We do not look for draughtsmen's designs from architects. Taste can take precedence of precedent. The true architect takes fire most when confronted by a problem. It is the reconciling of inconsistencies that gives life to his design. Why should we find the irregularities of old work, the freedom of good classic design, the imperfections in logic of the English Gothic so charming, and yet fear to have in our own work irregularities that have a reason and imperfections that make for comfort? It is seldom that faithful effort to combine good work with attention to the client's wishes will find that the two are really compatible; but if it does, if the architect finds at length that he must suffer opposition, he will be able to back it with good reasons.

The architect must, however, be on his guard against falling in with the wishes of his client when the latter wishes to do something that is not decent behaviour towards a neighbour or in the way of evading municipal regulations.

It must be remembered that at the back of his mind the owner is relying upon his architect to keep him within limits in these matters. He feels out in consultation how far he may go in considering exclusively his own interest, and will not think well of an adviser who lets him go too far. It is the architect's duty, in the first place, to see if the object the client has in view can be obtained without encroaching on the rights of others by further study of the plan or by original contrivance. If it is manifestly impossible to do otherwise than wrong, it becomes the architect's duty to point out to his client that in so carrying out his wishes he would be giving him bad service and that he must decline to do so.

Even at this pinch it must be seen that quarrelling with the client is not included. The architect must be reasonable or he is wrong. If the architect is reasonable he must be right; and he is most likely to meet with the respect which is his due and the deference to his opinion which the case demands. Where a client and his architect part in mutual anger, there is room for the architect to doubt the ethical correctness of his own conduct.

The question of taking part in competitions which exercised so much the minds of a past generation of the profession has been settled for practice by a compromise. *No architect really believes that there is any real ground for the idea of the general public that the best possible design for a building is to be got by making selection from a number of designs by different architects. One may say with certainty that the designs are not the best that can be made; for any of the same architects would produce better results if they had an opportunity of studying the problem quietly in consultation with the clients. Nor is the selection that is made at all certain to be the best selection.* But, because competitions offer such a chance of a short cut to pecuniary success, there are always architects to be found who will support them. The Councils of the profession have, therefore, agreed to accept, as offering some chance to be productive of good work, those competitions in which the competitors are paid for their sketches, so that they can afford to put into them a proper amount of study.

In conclusion, it is fitting to notice how important it is, in order to practice architecture with ethical correctness, that architects should be associated, not only to discuss and elucidate questions bearing upon such practice, but to give one another the support of companionship in sustaining a standard that it is hard to uphold alone. The honourable among the dishonourable is apt to suffer loss; and if we agree in approving of the honourable practice of our profession we had better agree in practising it thus together. This is the reason for professional associations, and it is also a reason why they should not be so wide open as to include practitioners who are unfit or unwilling to give good service to the public. Membership in our associations should be so obviously an advantage, not only from the professional standing it gives, but from the interest and value of the proceedings, that every one who undertakes to practice architecture will find it important for him to seek membership and to devote himself to the kind of professional service that the association exists to uphold.

Our 70th Competition.

Owing to the fact that the "Conditions" of these competitions have not been complied with (only two designs having been sent in) no prize can be awarded. The two designs received were "Efficiency," by Edgar Miller (with Mr. H. M. Helm, of Wanganui), and "Arch," by Ernest H. Hutton (with Mr. Basil Hooper, of Dunedin).

Mr. C. Reginald Ford, of Wanganui, who kindly set this subject, reports as follows:—

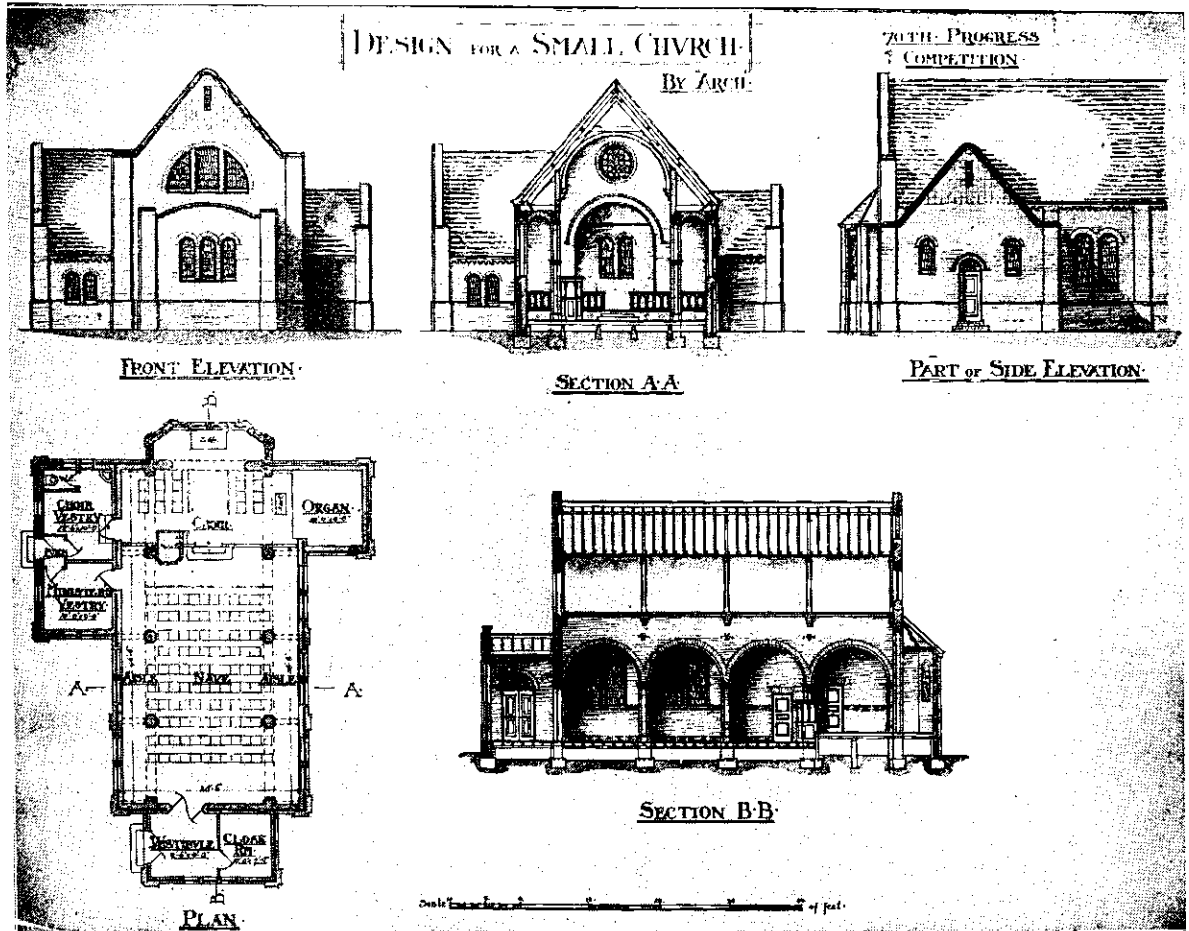
"The result of this competition has been a disappointment, only two competitors entering. The design by 'Efficiency' I judge to be by a very

youthful student—perhaps in his first year. It is crude in design, and the draftsmanship leaves very much to be desired. Carelessness is shown in the spelling, but at the same time 'Efficiency' should not be discouraged. He has shown interest in his work by entering for the competition, and should seize every opportunity for further study of design and draftsmanship, and I shall look forward to seeing his work in future competitions.

"The design by 'Arch' is good, and would look better in execution than in the drawings. The

wick School Chapel in *Recent English Ecclesiastical Architecture*, if this work is available to him.

"Neither competitor has made much effort to make the sheet of drawings as a whole present an attractive appearance. A simple border alone would have helped in this. They should look at some of the competitive drawings in the English and American architectural publications. The lay-out of the different plans, etc., and the title and sub-titles can all be made to play their part in producing an effective sheet of drawings, which is



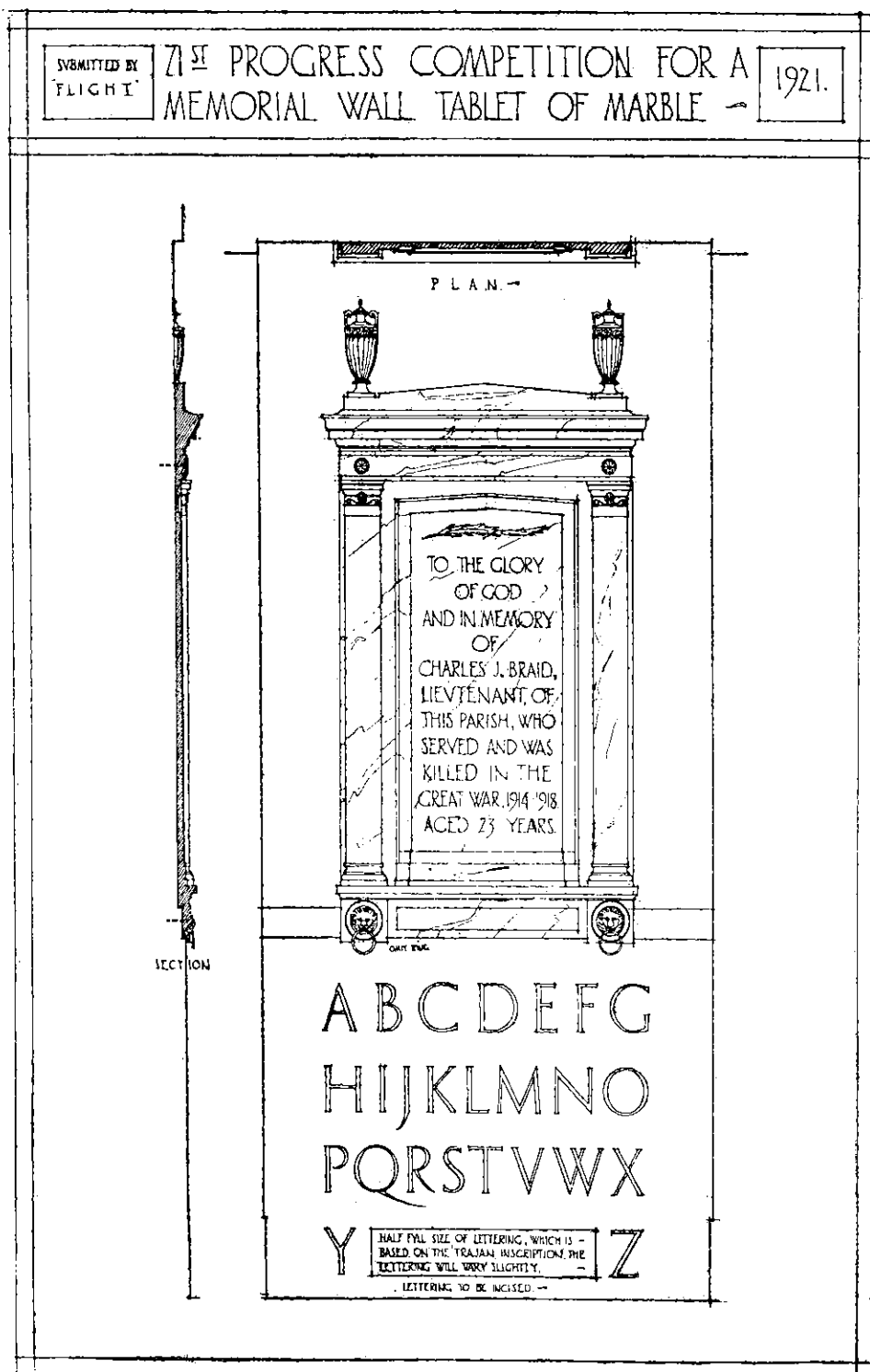
Design "Arch," by Ernest W. Hutton (with Mr. Basil Hooper, of Dunedin) sent in for our 70th Competition.

treatment of the vestibule and cloak room at the western end might have been improved both in plan and elevation with considerable added interest to the design. The doorways to the vestries should have been treated more architecturally. The conditions, too, stated that there was money available to enrich some portion of the interior. 'Arch' has not quite risen to the occasion in the manner I had hoped—the imaginative quality is lacking. Perhaps, however, I expected too much. 'Arch' should have a look at the plans of Giggles-

wick as an indication of the possession by the draftsman of an orderly mind—a quite necessary quality in an architect."

Common Sense.

Common sense would indicate that at the earliest possible day this, and other States, should set aside certain areas for reforestation and keep them from any possible danger of damage by cattle or fire.—*Tampa Tribune*.



Winning design, "Flight," in our 71st Competition, for a Memorial Wall Tablet, by G. F. Wilson (with Messrs. Prouse & Gummer, of Auckland).

Our 71st Competition.

Six designs were submitted in this competition, viz.:—"Kauri," by Ernest R. Hutton (with Mr. Basil Hooper, A.R.I.B.A.), of Dunedin; "Amor," by R. Hall (care Government Architect's Office), Wellington; "Oak," by K. W. Hassell (with Mr. Wm. Fielding), of Wellington; "Kiwi," by W. A. Yates (with Messrs. Broadbent and Royds), of Invercargill; "Panikau," by Bernard Kennell (with Kennell Bros.), Gisborne; "Flight," by G. F. Wilson (with Messrs. Prouse and Gummer), Auckland.

Mr. Wm. M. Page, of Wellington, who kindly set this subject, reports as follows:—

"Six designs were submitted in this competition. It is disappointing that these competitions are not more largely taken advantage of, as they serve a most useful purpose and ought to be welcomed by every student in the country. I can think of no other reason for the small number of entries in these competitions than that the students as a body are not interested. I suggest that in those towns where there is an Architectural Students' Association the subject should be studied and worked out in the class. Where there is no Students' Association two or three of the students should work together to their mutual benefit.

"In the present competition there is, I regret to say, no difficulty in placing the designs. The design by 'Flight' is the only one that satisfies me as being appropriate. I therefore place it first. The proportions are good and the detail restrained and refined, and altogether the tablet is very satisfactory. The lettering, too, is excellent and based on a good example.

"Of the others that by 'Kauri' is the best, and I place it second. Carefully detailed it would be fairly satisfactory in execution, but the drawing hardly does it justice. It is rather unsympathetic and lacking in delicacy. Compare it with 'Flight's' drawing: the lettering is not so good either.

"'Amor's' design I disqualify, as there is no detail of the lettering. The panel, however, is quite good, only the enriched band should not impinge on the circular wreath at top of panel, but should run round on the half circle omitting the wreath altogether. The lettering of title on the drawing 'design by Amor' is exactly of the type that we wish to discourage. It is tawdry shopkeepers' price-ticket lettering.

"'Panikau's' design requires further study. Look up and study designs for monuments by Nicolas Stone in back numbers of the *Architectural Review*. The lettering and the drawing generally should be improved. 'Panikau' must avoid lettering on a curved line. It is never permissible in a rectangular panel, and is one of the signwriters' bad habits.

"'Oak's' design is very ordinary, but creditable for a beginner. The details and lettering require further study.

"'Kiwi's' design is of a type I do not care for, and gives no evidence of the study which it is the object of these competitions to encourage."

Structural Tiles.

A recent issue of the *Christchurch Press* published a description of a new invention in building by a New Zealander from its "Own Correspondent" in London. The writer says:—

Of the various constructional methods for housing schemes which have been placed before the Housing Department of the British Government, Mr. S. Hurst Seager (Christchurch), who is interesting himself in this matter, is of the opinion that the "McLeod System" holds second place only to the "waiver System."

Mr. W. McLeod, of Wanganui, brought his invention before the New Zealand Government some months ago. Since then, however, he has submitted it to various Government Departments in the United States, and has also brought it before the authorities in this country, with the result that it has been approved by the Ministry of Health.

Before leaving the Dominion he had a very comprehensive picture film taken of the process of building with the "structural tiles" he has invented, and recently Sir James Allen and Mr. Hurst Seager witnessed an exhibition of this film. For the construction of walls the system is undoubtedly an ingenious one. The "structural tile" units take the form of thin-sided hollow concrete blocks—one might describe them as concrete boxes, with no tops or bottoms. These units, which are very light and made in convenient sizes for handling, are placed in position in courses in the usual way, but no mortar is used. When the wall reaches a convenient height, say, five or six courses, concrete of a wet consistency is poured into the cavities and rodded, thus forming a monolithic wall. This procedure is repeated until the desired height is attained. Walls may be made of any necessary thickness, or a double wall may be built with an internal air space. Columns either round or square are easily formed. For curved walling and circular piers or columns the units are made with the required curve, and built up in the same manner.

The system is in effect one in which a monolithic wall is built without the use of removable shuttering, and the "structural tiles," in addition to providing the forms in which the concrete is held in position whilst setting, also forms the surface of the finished wall. If desired, reinforcement can be incorporated in the wall either horizontally by laying rods throughout the length of the wall in the cavities formed in the units for the purpose, or vertically by embedding rods in the cavity of the wall as the work proceeds.

Mr. McLeod maintains that beside all the obvious advantages of the system for mass production, walls of houses may be erected at a cost of 25 per cent. less than those built of bricks, and this is borne out by the report of a well-known firm of quantity surveyors. It is proposed to manufacture the tiles in factories equipped with machinery such as are already used for similar purposes in America, where machines are in use which are turn-

ing out 12,000 tiles in 7½ hours. The cost of such a machine would probably be about £2,000. Mr. McLeod, however, in the course of his investigations, has found that a cheaper method would be to make the tiles of clay, the machinery for which could be installed in ordinary brickyards for a comparatively small cost.

Architectural Competitions.

COPY OF MEMORANDUM DRAWN UP BY THE ROYAL INSTITUTE OF BRITISH ARCHITECTS.

The following Memorandum has been drawn up for circulation throughout Great Britain, its purpose being to inform promoters of competitions of the course they must adopt if they wish to secure without delay the co-operation of those who are best qualified to provide designs for the buildings they have in view:—

Public bodies and others have of late years frequently had recourse to competitions amongst architects where buildings of a public or otherwise important nature are needed. It is assumed that the motive prompting bodies who promote such competitions is that they are desirous of getting the best design possible for their project. Architects taking part in such competitions are naturally desirous of producing the best possible designs. It will, therefore, be readily seen that the interests are identical.

It not infrequently happens, however, that conditions issued in connection with such competitions are faulty and offer no inducement to architects to compete. When such conditions are brought to the notice of the Royal Institute of British Architects or the Society of Architects, the authorities concerned are at once communicated with and the defective or unsatisfactory clauses in their conditions pointed out. In many cases the authorities concerned (who it has been found have usually drawn up their conditions in ignorance of the Regulations published by the R.I.B.A. and the Society of Architects) are willing to revise their conditions so as to render them satisfactory. In other cases, however, no such desirable results have been arrived at, and, in consequence, many competitions have of necessity been banned. When this has occurred sometimes no designs have been submitted, and often only a very few designs from architects of little or no standing in the profession.

If the regulations governing such competitions were adopted by all bodies promoting them much vexatious delay would be avoided, and the banning of competitions would be at once rendered unnecessary. Promoters who are considering a public competition in its earliest stages should at once appoint an experienced professional assessor to advise them. He will draw up the conditions regulating the competition, incorporating in such conditions all the essentials needed by the promoters,

and he will at the same time be fully conversant with the regulations issued concerning architectural competitions, to which he will closely adhere. His advice will also be invaluable to the promoters in arriving at the technical answers to questions, in deciding what is a reasonable cost for the buildings, and finally in judging the best design and the practicability of its being erected for the cost stipulated. Further, the fact of a good assessor having been appointed has a strong moral effect upon those of his fellow-architects who are contemplating the preparation of a design. They would naturally prefer their design to be judged by one who is expert in the subject rather than by a committee of laymen who cannot hope to possess the necessary qualifications in this respect. If the promoters so desire, the President of the R.I.B.A. or the Society of Architects will be pleased to advise them in the nomination of an assessor.

The Royal Institute and the Society of Architects again point out that they have no desire to place a ban upon competition. It cannot, however, be too clearly stated that unless public competitions are promoted in such a manner as will ensure a satisfactory decision, and the conditions are in accordance with the regulations issued by these bodies, delays and disappointment will inevitably follow.

[The document is signed by Messrs. H. V. Lancaster (F.), W. G. Wilson (F.), and Herbert A. Welch (A.), respectively Chairman, Vice-Chairman and Hon. Secretary of the R.I.B.A. Competitions Committee, and by Mr. McArthur Butler, Secretary of the Society of Architects.]

Personal.

We have received advice that Mr. Arthur J. Palmer, architect, of Auckland, has been elected an Associate of the Royal Institute of British Architects.

Advice has been received that Mr. William M. Page, architect, of Wellington, has been elected a Fellow of the Institute of Scottish Architects.

Mr. H. M. Helm, who has been practising architecture in Wanganui for some years, is giving up the practice of his profession in favour of the land. He has purchased a farm in the Motueka district. Mr. Helm, who learnt his profession in England, has been responsible for the design of a number of successful residences. He was the author of the design placed fourth in the Dunedin Town Hall Competition, and second in that for the Sargent Art Gallery. His design in the latter competition was very highly spoken of by the assessor. Amongst Mr. Helm's larger works are the well-known Hotel Braeburn, and the newly-completed Anglican Church School, both at Wanganui. His practice has been purchased by Messrs. Ford and Talboys.

The N.Z. Institute of Architects' Library.

At the last annual meeting of the Institute the Library Committee recommended the purchase of a fairly comprehensive list of text and reference books, to be kept at the head office and circulated amongst the several branches in a manner to be arranged. The idea of a central library did not, however, appeal to the members, and the portion of the Committee's report dealing with this matter was referred back with a recommendation to reconsider the point and to establish, if possible, seven smaller libraries amongst the seven branches.

At the conclusion of the regular meeting the Chairman of the Library Committee called a conference between his Committee and the leaders of the different branches, when a *modus operandi* was agreed upon.

As a result of this meeting seven sets of books have now been ordered from England, and on their arrival they will be dispatched to the seven branches subject to certain regulations which will be issued shortly. It must not be supposed, however, that the Council contemplates the establishment and maintenance of seven complete architectural reference libraries; such a course would be far beyond its financial ability. The works purchased represent a few of those text books most frequently required for students, and it is hoped—and, indeed, expected—that the branches and the individual members will recognise their personal obligations to contribute towards the development of a good library of which the present purchase is but the beginning.

The following is the list of the books ordered:—

- Essentials of Composition (Van Pett).
- History of Architectural Development (Simpson).
- Short Critical History of Architecture (Statham).
- French Renaissance Architecture (Ward).
- Gothic Architecture in England (Bond).
- Pierre Esquie's Book on the Orders.
- Architectural Shades and Shadows (W. Goodwin).
- Principles of Structural Mechanics (Waldrums).
- Architecture of the Renaissance in Italy (Anderson).
- Architecture in Greece and Rome (Anderson and Spiers).
- Architectural Drawing and Sketching in Perspective (Roberts).
- The Growth of the English House (Gotch).
- Memorials and Monuments, Old and New (Weaver).
- English House Design (Mullnott).
- Town-Planning in Practice (Unwin).
- Styles in Ornament (Meyer).

The Society of Architects, London.

"One of the features of the Society's activities is its readiness to use the facilities provided by the Press for ventilating questions and disseminating news of public interest, and during the year statements emanating from the Society have appeared, on an average, every day in one or other of the principal newspapers and professional journals in this country and overseas. This has been found of mutual advantage, as the Press and the public have been quick to recognise the Society as a source of information on professional matters, and *the Society has, through the courtesy of the Press, been able to stimulate public interest in architecture and demonstrate the position which the architect holds as a servant of the public in the scheme of national service.*"—*Architects' Journal*, January 19th, 1921.

Two Prices.

Education Boards and Builders.

The question of differential prices of building materials has been raised in a very emphatic form by the conference of Education Board building experts which met in Wellington recently. These gentlemen, who have carried out building in all parts of New Zealand, met and compared notes with the most illuminating results. It was found that one Education Board, which carries out a fairly extensive building programme on its own account, is able to buy materials at a considerable reduction on the prices charged to private contractors. Here are some of the contrasts, as given to us by the Hon. C. J. Parr, Minister of Education:—

	Price to Board.			Price to Builder.		
	£	s.	d.	£	s.	d.
Kauri, heart, per 100 super	1	10	10	1	17	6
Rimu, per 100 super	2	3	10	2	15	6
Paints, per gallon	1	3	6	1	10	0

This question is worthy of the serious attention of the builders' organisation. Prices seem to be easing and there will be less dissatisfaction over the cost of materials than in the past. But a builder whose credit is good should be able to compete with an Education Board on at least equal terms.

Competition.

Designs for a "Bridge of Remembrance" over the Avon, at Cashel Street, are invited by the Christchurch War Memorial Committee. A first prize of £100 and a second prize of £50 are offered. Conditions are obtainable from the Town Clerk, Christchurch, or from the joint Hon. Secretaries, J. Wyn Irwin and A. C. Reed, Box 199, Christchurch.

Mr. Leslie D. Coombs, A.R.I.B.A., of Dunedin, has been appointed assessor at the instigation of the Christchurch Branch of the N.Z.I.A.

Sawmilling Section.

[This Section is published by arrangement with the Dominion Federated Sawmillers' Association (Incorp.) in the interests of the Sawmilling Industry of N.Z.]

Acting Editor: ARTHUR SEED.

Mr. W. T. Irvine returned from Sydney on 5th instant, and his many sawmilling friends will be pleased to know that he felt much benefit from his holiday and stay in Australia, but unfortunately a hurried trip to Queensland just before he left appears to have given him a slight setback, and he arrived here feeling not altogether too well. During his stay in Australia he enquired exhaustively into the state of the timber trade in Victoria and New South Wales and became conversant with the work that is being carried on in these States and Queensland by the State Forest Services, and has brought back with him a very exhaustive and valuable report on these matters, which is now in the printers' hands and which will shortly be distributed among sawmillers by the Federation. In view of the apprehension felt in this country of the possibility of immediate foreign dumping, the following paragraph is well worth quoting from Mr. Irvine's report:—

"Royalties are computed on log measurement and sawmillers are required to keep correct records of log measurements and sawn output, which are subject to inspection by officers of the Department. In New South Wales the rough class of timber dealt with rarely gives a sawn output exceeding 50 to 60 per cent. of log measurement. The Commissioners are fully alive to market conditions and the prices of local and imported timbers, and, having regard to the heavy stocks of Baltic and Oregon held by merchants and the probability of a further reduction in price of these, they are apprehensive of the effect such action would have on the local product, and the Victorian Commissioners are disposed to advocate the taking over of the whole control of the timber business. Under present conditions the merchant or importer carrying heavy stocks has it in his power, by united action, to reduce the price of the imported article to enable him to unload and to raise the price of the local product and assist to block its sale, the result of which might lead to the closing down of local mills, throwing a large number of men out of employment and reducing the revenue of the Forestry Department by the amount of royalty which would have been otherwise payable. Another method of obviating such a position is suggested by increasing the duty on imported foreign timber by 5s. or 6s. per 100ft., but in this connection it must not be forgotten that Victoria imports an average of 100 to 120 million feet of soft timbers per annum for her normal requirements. In Victoria prices are not under control—the Profiteering Board having been dissolved—but

in New South Wales there are no fewer than three bodies exercising control of trade and prices, viz.: the Board of Trade, Profiteering Prevention Court, and the Necessary Commodities Commission."

Another point which Mr. Irvine's report discloses is that during the war period the Australian market was very bare of timber and imports practically ceased, and in order to acquire the necessary quantities of timber for carrying on the essential needs of the country attention was directed to hitherto unexploited native timbers. In this way a great number of the new mills were started, and a very much greater percentage of natural forest wealth was made use of than ever before by bringing into the mill and manufacturing into lumber rougher portions of the trees that had hitherto been left, and also new classes of trees which had hitherto been considered forest weeds. This process carried into effect one of the highest ideals of forestry in making greater use of the natural forest wealth. The present over-importation in Australia and the possible dumping of Oregon in New Zealand will have the effect of closing the markets to the rougher and more inferior classes of native timbers and thus very materially retard the progress of forestry in both countries.

Timber Cutting Rights.

NO BIDS AT AUCTION.

From the *Dominion* of April 1st.

At the sitting of the Land Board yesterday afternoon the right to cut and remove timber, estimated to consist of 22,962,200 superficial feet, was offered at public auction, and there was not a single bid for any of the lots. The conditions of sale were the usual ones in connection with the cutting of timber on Crown lands, and the timbers comprised totara, matai, rimu, miro, and kahikatea. There were five milling areas in all, as follows:—

Lot 1.—Sections 7, 8, 9, 10, 13, 14, Block IV., Hautapu Survey District: Area, 886 acres 2 roods. Estimated quantity in superficial feet: Totara, 2,909,500; matai, 1,971,000; rimu and miro, 225,000; kahikatea, 5,538,400. Upset price, £29,520. Time for removal of timber, six years.

Lot 2. Sections 19, 20, Block IV., Sections 12, 14, 15, 16, 18, Block VIII., Hautapu Survey District: Area, 465 acres 0 roods 20 perches. Estimated quantity in superficial feet: Totara, 1,169,400; matai, 619,400; rimu and miro, 71,500;

kahikatea, 3,378,200. Upset price, £14,265. Time for removal of timber, five years.

Lot 3. -Section 5, Block XV., Manganui Survey District: Area, 195 acres 3 roods 20 perches. Estimated quantity in superficial feet: Matai, 665,600; rimu, 2,970,900; kahikatea, 1,687,200. Upset price, £7,986. Time for removal of timber, four years.

Lot 4. -Section 26, Block III., Makotuku Survey District: Area, 27 acres 3 roods. Estimated quantity in superficial feet: Matai, 27,800; rimu, 83,300; miro, 55,500; kahikatea, 111,000. Upset price, £277. Time for removal of timber, one year.

Lot 5. Section 21, Block II., Maungakaretu Survey District: Area, 69 acres 3 roods. Estimated quantity in superficial feet: Totara, 217,900; matai, 210,300; rimu, 795,200; kahikatea, 251,100. Upset price, £1,850. Time for removal of timber, two years.

Although there was a representative attendance of millers who were aware of the upset prices, there was not a single bid, and the general opinion of the Board was that the prevailing financial stringency had scared the millers or else they were unable to arrange the finance.

It will be noted that the general opinion of the Land Board was that the prevailing financial stringency prevented the sawmillers from bidding for these timber cutting rights, but an analysis of the figures might disclose another reason why sawmillers are unable to purchase timber at such high royalties in face of the present financial and trade outlook. Taking the total super. feet in all the sections and the total upset prices it would appear that the average royalty asked is slightly over 4s. 8d. per 100 super feet and the average "stand" is 11,000 feet to the acre, which in itself indicates bushes little better than "sparsely timbered country." Again, the above figures show that the average royalty would work out at £25 13s. 4d. per acre, and it must be remembered that the miller would not be buying the *land* but only the right to remove the timber in a given time; and the time allowed for the removal in most instances is far too short. Taking Lot 1 as an example, the upset royalty asked is 5s. 7d. per 100 super (and this is on a log measurement estimate which means a royalty of 8s. 4½d. per 100 sawn measurement), and the average "stand" is 12,000 feet to the acre, which works out at a payment of £33 10s. per acre merely for the right to remove the timber within the limited time of six years.

From the above figures it would appear that the average upset royalty expected by the Government is to be in the vicinity of 5s. per 100 log measurement, or 7s. 6d. per 100 sawn measurement, which will certainly not tend for cheaper timber to the public in the future. It does not seem very astonishing therefore that there were no bids offered for the cutting rights in question, especially in view of the general outcry for cheaper timber and the prospect of foreign dumping. To cut Lot 1 in six

years would mean the establishment of a sawmill capable of cutting 1,774,000 per annum, but as under present conditions it would take fully a year to get a mill thoroughly established for cutting, with necessary tramways, cottages for employees, etc., it is only possible to estimate on five years' actual cutting, which means an annual output of 2,125,000 per annum, or, on a 300 cutting day year, roughly, 7,000 per day. This would mean an outlay of certainly not less than £10,000 to £12,000 under present costs and conditions for machinery, mill building, tramways, bridges, cottages, barracks, etc., etc.; but this cost would be very largely dependent upon situation. However, taking a moderate estimate of £10,000 plus the £39,520 asked for the cutting rights, it would mean that the miller would require to provide for the payment of £39,500 out of his cutting for five years, for unless he had other adjacent bushes to go straight into for continuous cutting it would mean that the life of the mill would then cease and the whole of the plant, buildings, etc., would have to be sold as "scrap." With the normal wages, maintenance, etc., cost of production, therefore, it is quite clear that under these circumstances timber could not be produced cheaply; and it is certainly not astonishing that there were no bids for the cutting rights in question.

Dumping.

Persistent rumours have been recently afloat of merchantable oregon pine being offered at the main ports of New Zealand at a very low c.i.f. figure, and it is plain to see that the American lumber trade is feeling the financial stress that appears to be world-wide, and it looks as though the sawmilling industry in New Zealand will shortly be faced with the wholesale dumping of second-class oregon at prices very considerably below the cost of production in the country of origin, and also below the cost of production of o.b. rimu with which it comes into direct competition. If this dumping be allowed the industry may look forward to similar times of unemployment as those experienced round about 1907, when it was possible to market only the highest grades of our local timbers, and the greater proportion of the actual timber available from the bush had to be burnt. Side by side with the possibility of this disastrous state of affairs we have constant reminders in the daily Press, and cables from London reporting meetings of the Empire Forestry Association, stressing a fear of a more or less world-wide timber famine, owing to the fast disappearing sources of supply. Also we have some of the local newspapers lauding the efforts of the Institute of Architects to not only prevent the export of our native timbers but to entirely remove the duty on imported timber, and the instigators of this movement appar-

most millers and timber merchants, as the matter entirely consider that by this means our local timbers will be conserved, instead of the very reverse being the result. If these people stop to think they must realise that where so large an industry as that of sawmilling is established with such vast aggregate outlay of capital, and where such a very large body of workers and families are dependent upon the industry, it is impossible for the mills to be closed down without causing widespread unemployment and hardship. Consequently the mills must be kept going, and if prices fall and cheap dumped timber floods our markets the lower grades of our local timbers will have no sale, and as a result will either be left to rot in the bush or thrown on the slab heap and burnt. The unfortunate miller will then be again the chopping-block, for he will be accused of "slaughtering" our forests as he has been accused in the past, and when our American competitors have tided over their financial difficulties by this process of raising cash by dumping (meanwhile, also by so doing, keeping up their local prices) the result will be exactly as before and our industry will be left crippled owing to the temporary expedient of the American lumber industry, and the prices of oregon will again soar. Meantime many millions of feet of available timber in our local forests at present being put to profitable uses will have gone up in smoke, many sawmillers will have been forced to the wall, and much unemployment and misery will have been caused to employees and their families in far-away corners of bush where transport is difficult and costs of moving families now comfortably settled greater than can be met at short notice by the workers concerned. And be it remembered that the average New Zealand bushman and sawmill worker is a fine stamp of man who works hard, has none of the pleasures or alleviations of the town-dweller, and is deserving of every consideration and encouragement in his industry. What is to be the use of our recently established Forestry Department, whose aims and objects—which have been so lauded of recent months by the public Press—are to bring about the better utilisation of our forest products, the economic milling of our trees and the conservation of the remainder of our forest heritage, if foreign dumping is to be allowed to displace a large percentage of these very forest products from their natural market and cause the sawmilling industry to languish, with the resultant widespread unemployment and misery among the workers in remote districts? Also it is to be remembered that the importation of the lower grade of oregon from America means the "exportation" of the equivalent of New Zealand's hard cash at a time when we are faced with very severe financial difficulties in our own country, and each shilling of this cash would otherwise be expended to help find employment for our own people at a time when we are faced with grave prospects of widespread unemployment.

Afforestation—Empire's Outlook.

EFFORT TO STIMULATE INTEREST OVERSEAS.

This item from London is most interesting as an indication of the importance of timber and the prominence forestry matters are assuming throughout the Empire, but if the cable was published throughout Australia in the form it has been here the *Australian Forestry Journal* will probably have some comments in next issue, for Forestry Departments were established in several Australian States considerably before New Zealand made a move, and in the matter of forestry legislation they have a big lead on this country:—

Lord Novar, President of the Empire Forestry Association, addressed the Dominions' High Commissioners and Agents-General for the purpose of forming the branches of the Associations overseas. Lord Novar explained that it was a purely voluntary movement intended to supplement the work of the British Forestry Commission and the Empire Forestry Bureau. He regretted the Empire's backwardness in forestry, notably in Australia. Only recently a Forestry Department was created at Papua, and they were still without a single forestry officer in Australia. New Zealand possessed valuable timbers, but these were insufficiently known and appreciated. It was probable that there would be a timber famine in the world unless reafforestation was undertaken. Australia was already looking abroad for supplies at high prices. It was probable that in the not distant future she would be glad of supplies at any price.

Lord Novar, Chairman of the British Forestry Commission, quoted an epigram attributed to Mr. Lanepole, of West Australia, that Australia's forestry policy was to make one blade of grass grow where two trees grew before. The Empire's timber resources amounted to 1,200,000,000 acres. About one-third of this was economically productive. Conservation was imperative, otherwise famine prices were anticipated in the near future. Prices would remain 200 per cent. above pre-war rates.

Sir James Allen paid a tribute to Sir Francis Bell for his work in stimulating forestry in New Zealand. He suggested that the promoters should confer with Mr. Massey when he visits England. The Australian Agents-General spoke in favour of the association.—*N.Z. Times*, March 24th.

Timber Prices Fixed.

The regulations fixing the prices of timber in various districts have at last been gazetted—on March 24th last—after having been decided upon as far back as November. Except to those ones who were in close touch with the Board of Trade these regulations came as a considerable surprise to

had been hanging fire for so long that most millers considered that it had died a natural death. An explanatory circular has been issued by the Board with a copy of the Gazette notice to every saw-miller, but the main items in the regulations are that the maximum price of timber is definitely fixed in each district, the auctioning of timber is prohibited, and it becomes illegal for timber merchants to sell timber without a license. This practically means that the Timber Broker and "pocket-book man" will be put out of business. Recent Press comment has drawn attention to the lifting of the building regulations, but immediately on top of one set of regulations being withdrawn these new price fixing and licensing regulations are issued. Is the timberman fortunate or unfortunate to be the object of so much attention on behalf of the Government? Our own impression is that all these regulations are merely a hindrance to normal trading, and though it was probably necessary to regulate all classes of trade during the war period, surely we are now reaching a time when all these artificial restrictions on trade should be done away with as speedily as possible. However, if the timber industry is to be bound in every direction by cast-iron regulations as to prices, prohibition of export, and so on, surely it is also necessary that it should be likewise protected from unfair foreign competition and dumping. The question is often asked: "Why is the timber trade singled out for such undue attention?"

Our Wasted Heritage.

The Government have received strong support for their new, but sadly belated, policy of forest conservation, from an American visitor, Professor Wilson, Assistant-Director of the Arnold Arboretum at Harvard. The Professor concluded last week a tour of New Zealand, in company with Captain Ellis, Director of Forestry, which extended from North Auckland to Bluff, and included the West Coast from Hokitika to Nelson. As the result of his inspection of forest conditions in the Dominion, he held up his hands in horror. "The thing that has appalled me," he told a Wellington interviewer, "is the awful waste, the awful destruction of timber that has gone on, and is still going on, throughout your country. I am appalled and shocked. I cannot find words to express adequately how I feel about this awful waste of the country's heritage. Your forests here could be, and should be, your greatest source of national wealth, and the way they have been destroyed almost leaves me speechless. Except on the Canterbury Plains, where there never were any trees, I don't think that, with the possible exception of about twenty miles in the Buller Gorge, I have been out of sight of stark, burnt trunks the whole time I have been in New Zealand." It was the senselessness of the destruction that particularly distressed him. He recognised that bush covering good agricultural land had to go, but it should be marketed, not

burned. But it appalled him that bush on land that would never be good for grazing or agriculture—mountain tops, and rough hilly country—should also have been burned off, to give place to an impenetrable tangle of gorse and blackberry. "I have seen land that would not feed a sheep to five acres cleared of thousands of pounds' worth of timber," he said. "It will not even feed a sheep to five acres for more than four or five years. As soon as what little foodstuff is in the soil is exhausted, that is the end of it." From these bare hill-tops the scanty soil is often washed away, rendering them absolutely barren, while, though Professor Wilson did not specifically mention it, the stripping of the natural covering of the watersheds must affect the rainfall, the flow of the rivers, and in time the climate. The worst of it is that the process of wasteful destruction is still going on. A contributor to the *Post* describes a recent "splendid burn" on the Gowan Crown settlement in the Buller Gorge, where valuable bush, containing a quantity of fine rimu, went up in smoke and flame in a day, in order that one of the settlers might effect the "improvements" which the Government make compulsory. Settlement cannot, it is true, wait for the milling timber to be cut and marketed, but it is only unable to do so because, as the *Post* points out, settlement is often in advance of the transport facilities necessary for getting the timber out, and for the cause of that one has to go back to the neglect of past Governments in the matter of roading. There is, however, no use in crying over the bush that has been so sadly wasted; what remains is for the Government to profit by the folly and stupidity of the past, and give sane conservation of the existing bush, and scientific reafforestation a much more important place in their policy than has hitherto been deemed necessary.

When You Are Gone.

Plant a tree. You found several here when you landed on this old earth and you've seen a great many cut down during your time. You have probably cut down a few yourself. The children who are born after you have passed on have a right to find a few trees standing. But they will not if every person who passes through this vale of tears cuts down a few and forgets to plant any. Plant a tree. Plant a dozen of them, and then you will have done something for the generations who follow you, even as some one did something for you ages ago.—*Fort Lauderdale Herald*.

The Gum Tree.

The forests now existing must be cared for and their products distributed with due regard for conservation. They must be surveyed so that the Government will not have to depend upon vague estimates as to the forest resources of the country.—*Boise News*.

N.Z.I.A. Competition.

WELLINGTON BRANCH.

Students' Competition No. 1 (limited to students attached to the Wellington Branch only.)

Two book prizes, first value £3 3s., second value £1 1s., will be awarded to the successful competitors in the following competition:

Subject.—A measured drawing (plan, section and elevation) of the front of the Masonic Hall, Boulcott Street, drawn to a scale of 4 feet to one inch, and details of mouldings to larger scale; also a half-inch detail of the Order.

Sketch. A sketch of the building made on the spot.

Finish of Drawings. Measured drawings to be finished in ink without shading. Sketch may be finished in any medium.

Size of Drawings.—Drawings to be on Imperial size sheet or sheets except the sketch, size of which is left to the competitor's own discretion.

Time. Drawings to be sent in addressed to the District Secretary, Wellington Branch N.Z.I.A., 7 Woodward Street, Wellington, under a non-de-plume, accompanied by a sealed envelope containing competitor's name and address. Date of sending in, June 30th, 1921.

Our 73rd Competition.

We offer a prize of £1 1s. for the design adjudged the best for a

BAND STAND

to accommodate 30 players. Materials of brick or stone or both. To be open on all sides, and situated in the middle of a park, or public gardens, of a large city. No amount of cost is specified, but the design is to be refined and in good taste. The style to be Italian Renaissance in general character, but of a free type. Provision to be made under the stand for the storage of music stands.

Drawings to be to $\frac{1}{4}$ scale. Plan, elevation, and section and perspective. Drawings inked in and shaded.

Mr. Basil Hooper, A.R.I.B.A., of Dunedin, has kindly set this subject.

Designs must be sent in finished as above under a non-de-plume, addressed to the Editor "N.Z. Building Progress," 22 Wingfield Street, Wellington, and clearly marked "Seventy-third" Competition on outside, with a covering letter giving competitor's name, and address of employer. Designs must be sent in by April 27th, 1921.

Our 74th Competition.

We offer a prize of £1 1s. for the design adjudged the best for a

PANELLED LIVING ROOM.

Drawings Required.—(1) Plan of living room and elevations of all walls, showing fireplace, mantelpiece, doors and windows to $\frac{1}{2}$ in. scale. (2) Full size details of mouldings to panelling and mantelpiece. (3) $\frac{1}{16}$ inch scale plan of the house from which the living room is taken.

The $\frac{1}{16}$ scale plan of the house may be of any design known to the competitor, or from a published design, but the living room must have a floor area of not less than 250 sq. ft. or more than 450 sq. ft., and must contain a fireplace, beam ceiling and plaster frieze. The height of the room is left to the competitor's judgment.

It is to be assumed that panels of any size are obtainable. Marks will be given for good proportioning of panels and fireplace, etc., design of doors, and good draughtsmanship. Drawings must be finished in ink.

Mr. Gerald E. Jones, A.R.I.B.A., of Auckland, has kindly set this subject.

Designs must be sent in under a non-de-plume, addressed to the Editor, "N.Z. Building Progress," 22 Wingfield Street, Wellington, and clearly marked "Seventy-fourth" Competition on outside, with a covering letter giving competitor's name, and address of principal. Designs must be sent in on or before May 27th.

Our 75th Competition.

A prize of £1 1s. is offered for the best essay upon

THE PLACE OF THE TRADITIONAL STYLES IN MODERN ARCHITECTURE.

A writer in one of our leading daily papers, in criticising an architectural design recently, asked why architects should adopt some "style" in setting out to design a modern building. "Why," said he, "cannot an architect say what he has to say in his own natural way?" The essay is required to be an answer to this—a statement of the legitimate use of the traditional architectural styles in modern design.

The essay should not exceed 1,500 words. It is hoped that many students will take part in this competition. An essential part of an architect's equipment is to be able to express himself clearly and well. Besides the ordinary requirements of professional practice in the way of letter and specification writing, there are occasions when the architect may be called upon to give a reason for the faith that is in him, and he should be able to do so in clear and forcible English. Only practice will enable him to do this. Essay writing is excellent practice.

If of sufficient merit the winning essay will be published in *Progress*.

Mr. C. Reginald Ford, of Wanganui, has kindly set this subject, and will adjudicate.

Essays must be sent in under a non-de-plume, addressed to the Editor, "N.Z. Building Progress," 22 Wingfield Street, Wellington, and clearly marked "Seventy-fifth" Competition on outside, with a covering letter giving competitor's name, and address of principal. Designs must be sent in on or before June 27th.

Our 76th Competition.

We offer a prize of £1 1s. for the design adjudged the best for a

MONUMENTAL ENTRANCE TO A PUBLIC PARK.

Site.—A public park has a frontage of 250 feet on the principal street of a large town. Opposite the park two smaller streets 70 feet wide intersect diagonally with the principal street, which is 100 feet wide. The other boundaries of the park are enclosed by private property. The buildings on each side of park frontage are three-storey office buildings or club buildings of the Georgian period. There is a carriage drive in the park between an avenue of trees leading through the centre of the park frontage, with an Art Gallery at the end of the avenue.

Intention.—It is intended to form a monumental entrance to the park as a memorial, to be erected in stone. The design is to show dignity and restraint, purity of style, and harmony with surroundings, and the appearance from all points of view must be considered.

Drawings Required.—1. Sketches on tracing paper to be forwarded to include: Plan of general arrangement of streets and entrance, 32 feet to 1 inch; sketch elevation, 16 feet to 1 inch. (N.B. This sketch is demanded so that students' work may be judged on the working out of their original idea. Students should keep one copy of their sketch and send the other for the remarks of the assessor, who will retain the copies and forward his remarks on each design, which may then be completed and forwarded for final award. It is essential that students in this competition should not depart from the general idea indicated in their sketches, and if they depart materi-

ally will be set aside although the design may be most meritorious. 2. Finished drawings: Block plan to small scale; plan of entrance, 16 feet to 1 inch; elevation, 8 feet to 1 inch; drawings to be fully rendered in colour, pen and ink, or monochrome.

Mr. F. E. Greenish, A.R.I.B.A., of Wellington, has kindly set this subject.

Sketches must be sent in finished as above under a nom-de-plume, addressed to the Editor "N.Z. Building Progress," 22 Wingfield Street, Wellington, and clearly marked "Seventy-sixth Competition (Sketch)" on outside, with a covering letter giving competitor's name, and address of employer. Sketches must be sent in by May 10th, 1921.

Our 77th Competition.

We offer a prize of £1 is. for the design adjudged the best for

AN ART GALLERY

required for a country town to which has been bequeathed a small number of pictures and a few pieces of sculpture collected in Italy by the testator, at one time resident in the town. A sum of money has also been left for the erection of the gallery, which under the terms of the will is to be designed in the Italian style. The amount at the disposal of the trustees will permit the building to be erected of stone and to be appropriately finished throughout. A brief inscription indicating that the gallery is the gift of John Markham is to be introduced into the design.

Accommodation required: Two galleries, each approximately 1,000 square feet; hall, approximately 300 square feet; vestibule and loggia, sizes at discretion of competitor.

Drawings to be on Whatman paper, Imperial size, in Indian ink only, and to comprise plan, section, elevation. Optional: Half-inch detail of exterior or interior feature.

Mr. C. Reginald Ford, of Wanganui, has kindly set this subject.

Designs must be sent in finished as above under a nom-de-plume, addressed to the Editor "N.Z. Building Progress," 22 Wingfield Street, Wellington, and clearly marked "Seventy-seventh" Competition on outside, with a covering letter giving competitor's name, and address of employer. Designs must be sent in by July 27th, 1921.

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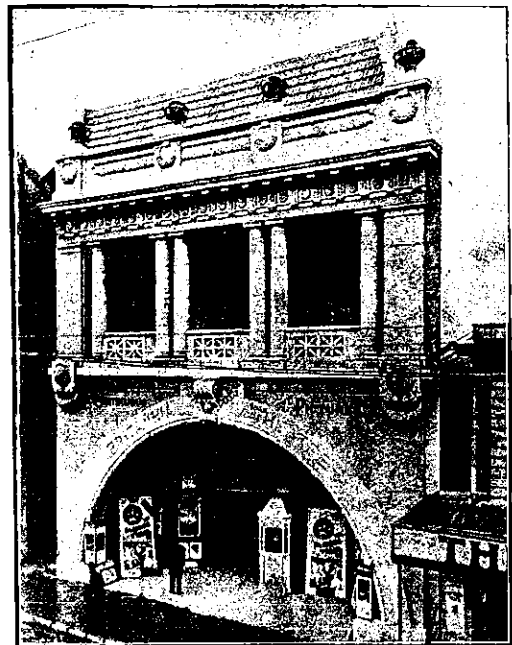
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Building Notes.

CHRISTCHURCH.

Messrs. England Bros. invited tenders up to late last month for the erection of a Methodist Church in brick on Cashmere Hills.

NEW PLYMOUTH.

Mr. Thos. H. Bates, of New Plymouth, and Messrs. Clere and Williams, of Wellington, invite tenders for the erection of a Club House at the corner of Queen and St. Aubyn Streets, New Plymouth.

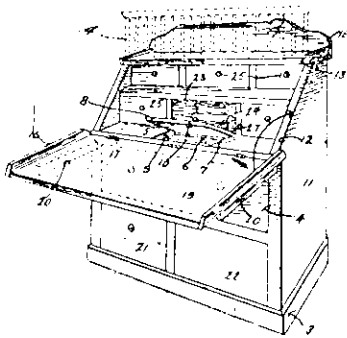
WELLINGTON.

Mr. W. Fielding invited tenders early this month for the erection of a residence at Brooklyn.

The Housing Superintendent of the Department of Labour invited tenders for the erection in Petone of timber frame construction on brick and concrete foundations, labour only and tools required. Also tenders were asked for concrete block construction, labour only and tools required. At Miramar tenders were also invited for a number of houses of concrete block construction.

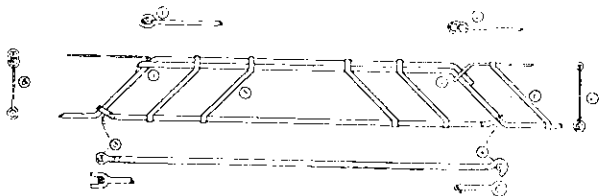
Patents of Interest to Builders.

Kitchen Cabinet.—A patent, No. 44,701, has been taken out by F. G. Blake, of 93 Lewis Street, Gladstone, Invercargill, Civil Engineer. It has a folding sloping top



which forms a table when let down, a central flour-container, drawers and compartments for various requisites, etc.

Concrete Construction Frame.—A patent, No. 43,118, has been taken out by Charles Stephen Mulliner, of City Engineer's Department, Town Hall, Auckland, N.Z., Structural Engineer; February 2nd, 1920. Cantilever-beams may be constructed with longitudinal tension-rods bent up at or near the point of contraflexure and carried



forward one beneath the other with centres of gravity in the same vertical plane, the ends of such tension-rods being secured by external pressure, or by the end of one of the bars on one rod passing round the other rod and being secured by external pressure, or by the end of one rod being bent down over or under the second rod and secured by a band either on the end of the top compression-rod or by a separate band passed round the two

PHONE 1649

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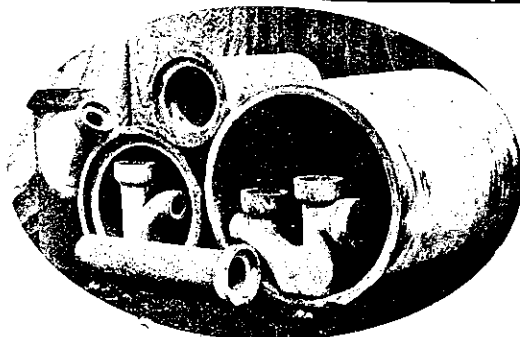
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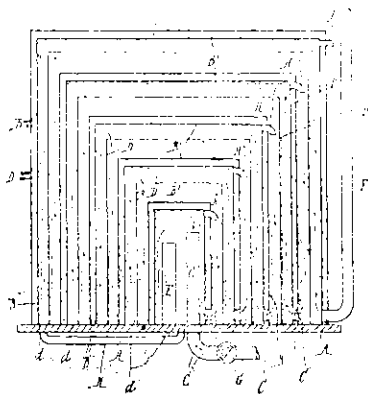
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tension-rods secured by external pressure. The compression-rods may be attached to the tension-rods of continuing beams by means either of a band or fork formed on the ends of the compression-rods and gripping the tension-rods, or by a hook formed on the ends of the compression-rods and gripping the tension-rods. Web-members may be attached to the tension and compression members at such angles and in such positions as may be necessary, such members being attached by means of bands formed on their ends and passed round the tension and compression rods and secured by external pressure.

Electrical Water Heater. A patent, No. 43,252, has been taken out by Mr. MacLennan, of Hamilton. It is formed by a number of water-chambers, separated by insulated walls, arranged to surround one another in series from the smallest to the largest, and connected



together, and to an inflow and an outflow pipe, so that water will pass into the outside chamber, through all the others in turn and into the inmost chamber, and will

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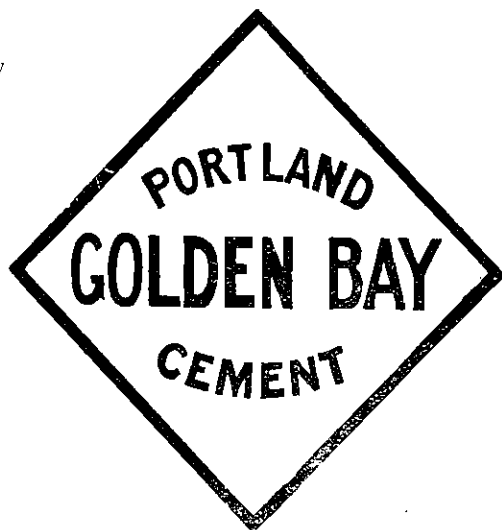
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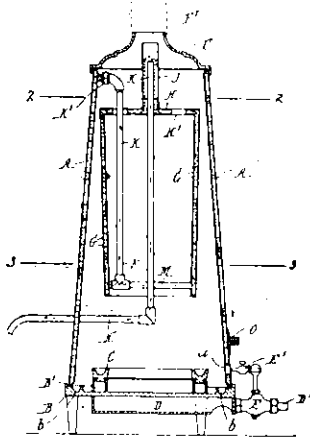
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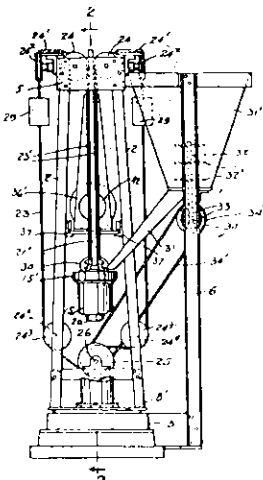
then flow away from such inmost chamber. The electric heating-element of any approved form is positioned within the inmost chamber so that the heat will radiate out from it through all the other chambers. Each chamber is also provided with a steam-vent in its top, opening into the next chamber, so that the steam or heat-vapour given off from each chamber will escape into the next chamber to heat the water therein. Baffles are provided to provide for water taking zigzag passage through each chamber.

Water-heater. A patent, No. 43,905, has been taken out by T. R. Evans, 28 O'Neill Street, Ponsonby, Auckland, sheet-metal worker. A pipe may be provided extending from and coupled to the top end of the outer



jacket and vertically downward within the inner jacket, and a pipe extending diametrically across within the lower end of such inner jacket and opening at its two ends into the jacket-space thereof, to which such vertical pipe is connected.

Cement Pipe Making Machine.—A patent, No. 43,220, has been taken out by James Thomas, of Washington, farmer. It comprises, with other features, the combination with a mould, a rotary table for supporting said mould, and means to rotate the table and said mould, a non-rotatable standard extending upwardly through the



centre of said table and terminating above the latter in a polygonal head, and a cylindrical core provided at its lower end with a socket, said socket being adapted to engage the standard at various rotary positions of the core to secure the latter against rotary movements,

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