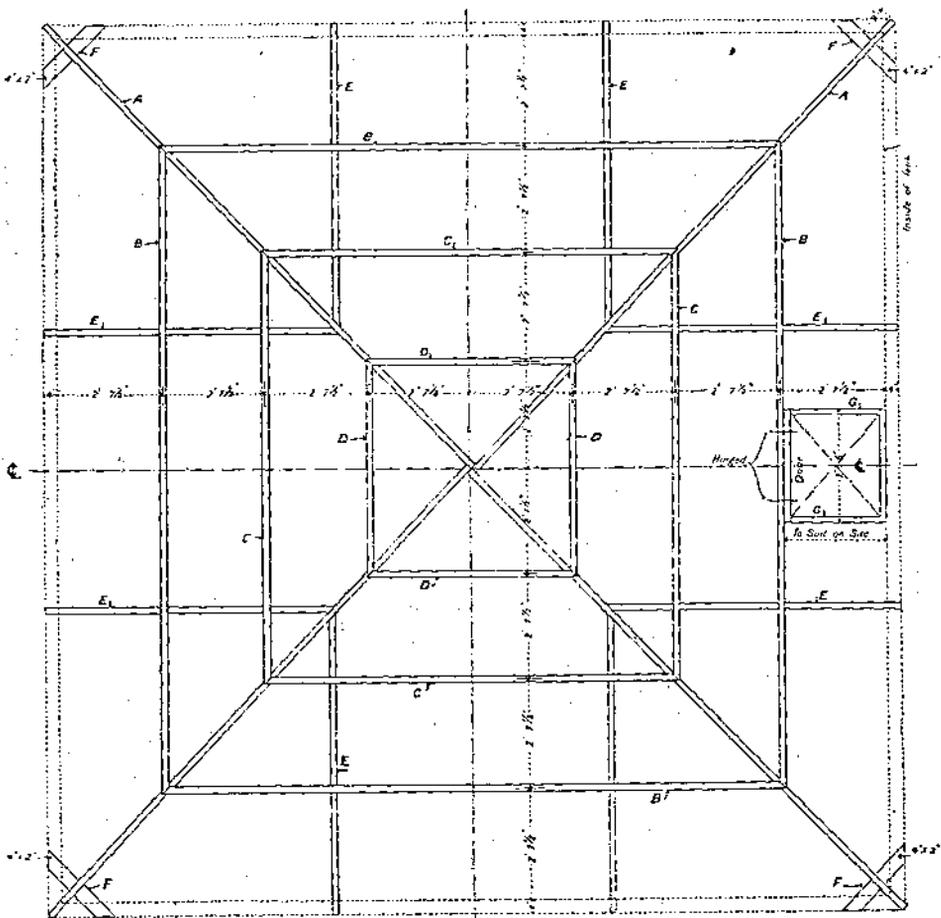
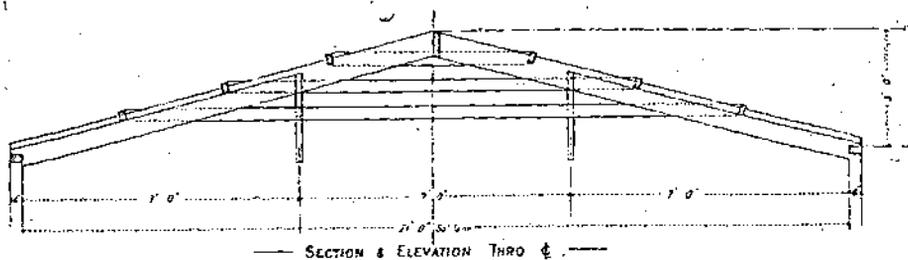


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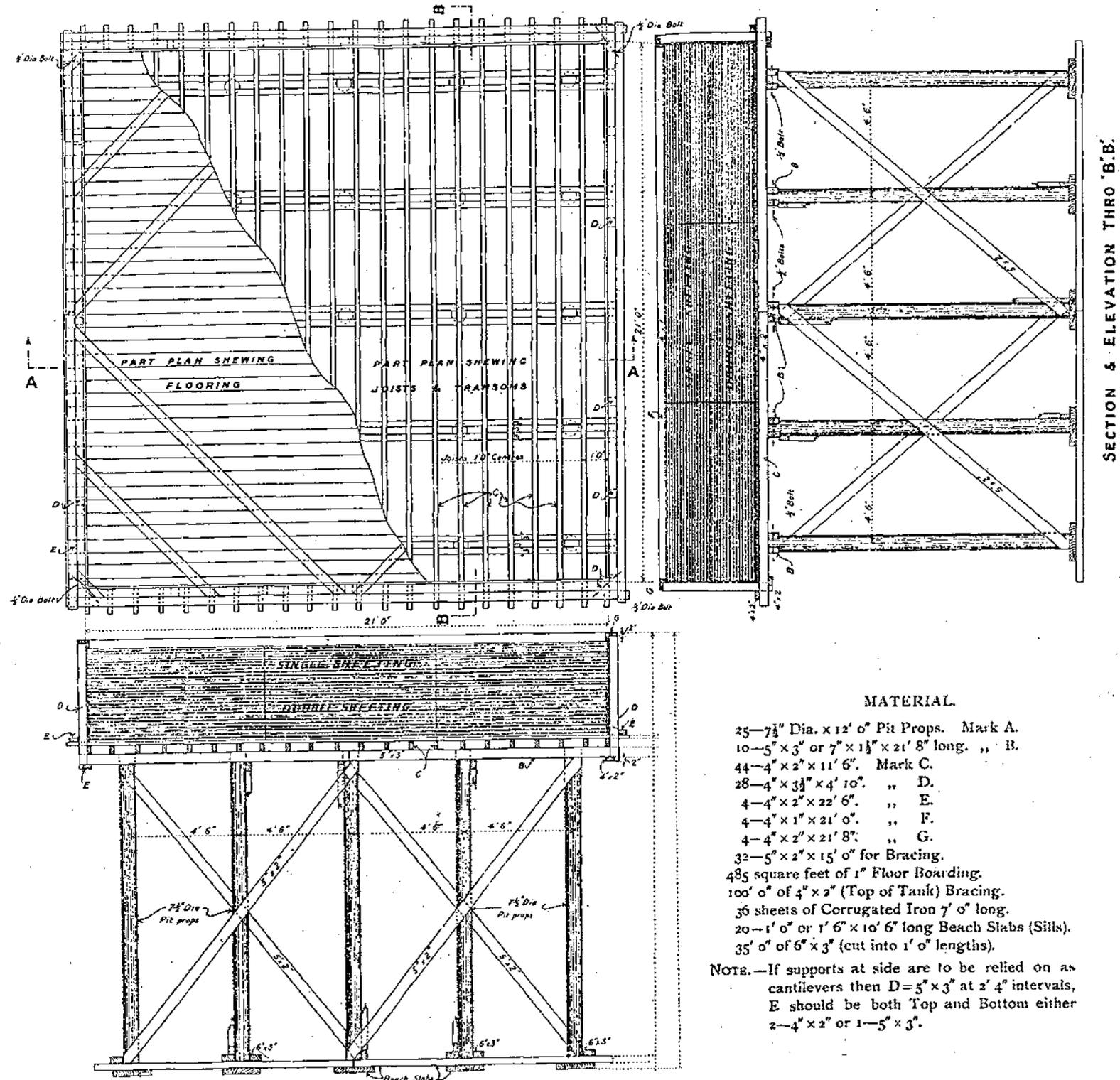
— PLAN —

NOTE.—Cover to consist of:—1st. Wire Netting. 2nd. Felting, or Canvas.

MATERIAL.

Hip...	4—7" × 1½" × 16' 0".	Mark A.	Purlins ...	8—5" × 1½" × 8' 0".	Mark E.
Rafters ...	4—3" × 2" × 16' 0".	" B.	" ...	4—4" × 2" × 2' 6".	" F.
" ...	4— " × 11' 0".	" C.	Door ...	1—3" × 2" × 9' 0".	" G.
" ...	4— " × 5' 6".	" D.			

WATER RESERVOIR TO TAKE A 30' x 30' TARPAULIN. CAPACITY ABOUT 11,500 GALLONS.



SECTION & ELEVATION THRO A.A

TARPAULIN WATER TANK.

By LIEUT.-COLONEL ARTHUR A. CROOKSHANK, R.E.

THIS reservoir was designed, on field service, to take a 30-ft. \times 30-ft. canvas tarpaulin (without eyelet holes). The water capacity of the reservoir is about 11,500 gallons.

The absence of eyelet holes reduces the capacity of the reservoir, as the edge of the canvas has to lie horizontally on top of the top rail instead of hanging vertically by the eyelet holes.

With a 30-ft. \times 30-ft. tarpaulin a depth of 5 ft. in round figures gives the maximum capacity, but in actual construction on field service a height of 5 ft. is too expensive and too heavy in materials. The depth is made 4 ft., as being more practical; the percentage difference between the capacity of 5 ft. and that of 4 ft. is small.

The canvas should be hung loose, *i.e.*, when in its final position it should not be taut; this helps to prevent the canvas from being under strain.

The tarpaulin, also the corrugated iron sheets to be tarred both sides; all squared timber and all natural (forest) timber up to 1 ft. above ground level to be tarred also.

The tarpaulin is liable to be moved out of position by wind pressure when the tank is empty or nearly empty.

It is therefore held in position by a skirting of 4-in. \times 3-in. timber with one corner rounded off, round the edge of the floor, and by vertical timbers 3 in \times 3 in. at each corner, also at 7-ft. intervals in the walls, the corner posts to have one corner rounded off.

The skirting is held by an octagonal framework of 3-in. \times 3-in. timber laid on the floor of the tank.

Roof.—If suitable materials (*i.e.*, for long rafters) are available the roof to be of the pyramidal type, as per design herewith. Roof covering to be of wire netting pulled taut, covered with canvas for horse water or felt for drinking water.

The outer covering to be coloured to match the surrounding ground, or else painted with lizard, tiger or leopard skin markings.

A small hinged opening in the roof covering to give access to the interior of the reservoir.

Foundations.—With foundations of the floating raft type, drainage is important; all surface water must be run off rapidly. The site to be protected by a barbed-wire fence.

Overflow.—A tell-tale to be provided if the tank is visible from the pumping station; if not, a telephone or electric bell. Also an overflow pipe.

Variations.—This reservoir was designed with floor level 12 ft. above ground level in order to provide a sufficient head of water for rapidly filling water carts and water lorries.

If this head is not required a similar design of reservoir can be built with floor at ground level.

If required for rapid work in following close on the heels of an advance in offensive operations, or under shell fire, a similar design of reservoir can be made of portable type by having the walls, etc., in two sections each, joined by bolts, wedges, or clamps, so that the whole can be packed on to a lorry and quickly erected on site.

CALCULATIONS FOR A WATER RESERVOIR TO TAKE A
30-FT. X 30-FT. TARPAULIN. WATER CAPACITY ABOUT
11,500 GALLONS.

By MAJOR N. W. BENTON, R.E.

RULING DIMENSIONS.

Ruling dimensions for purposes of calculation :—

Depth = 4 ft.

Sides = 21 ft.

Height above ground = 12 ft.

FLOOR.

Use 1-in. timber.

Find spacing of floor joists.

Load = 4 ft. of water = $4 \times 62.5 = 250$ lbs. per square foot.

Consider strip of floor 12 in. broad.

$$M_1 = \frac{wl^2}{8} = \frac{250}{12} \times \frac{l^2}{8}$$

$$M_1 = \frac{1}{6} rbd^2 = \frac{1}{6} \times 1200 \times bd^2 = 200 \times 12 \times l^2$$

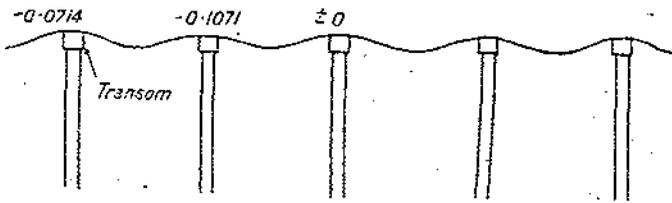
$$\therefore l^2 = \frac{12 \times 8}{250} \times 200 \times 12 = \frac{4032}{25} = 161.28$$

$$l = 12\frac{1}{2} \text{ in.}$$

Assume 12 in. centre to centre.

FLOOR JOISTS.

Assume that the floor joists rest on five transoms supported on five pillars.



Assume that floor joists broken at centre transom, and that they are continuous from centre to end of cantilever.

Refer p. 490, *Trautwine*, Edition 1913, for factors for continuous beams. As in this case a cantilever has to be allowed for, count the outside pillar as being the centre support of a continuous girder. The factors to choose are therefore those for four spaces. The cantilever can then be chosen of such length as, with the load of the floor on it, give it the same strain as the continuous beam would have had. To find this length compared with that of space between transoms we have

$$M_c \text{ (of cantilever)} = \frac{wl^2}{2}$$

$$M_c \text{ (of continuous beam)} = 0.0714wl^2 = \frac{wl^2}{14}$$

∴

$$l = \sqrt{\frac{1}{7}} l$$

$$= 378l \text{ (by slide rule).}$$

Now

$$4l + 2l^2 = 21 \text{ ft.}$$

i.e.

$$l(4 + 756) = 21,$$

i.e.

$$l = 4.42 \text{ ft. or } 53.1 \text{ in.}$$

∴

$$l^2 = 20.1 \text{ in.}$$

Assume spaces = $4\frac{1}{2}$ ft., i.e. 54 in.

Cantilever = $1\frac{1}{2}$ ft., i.e. 18 in.

To calculate the size of floor joists take the greatest M_F which is a negative one, viz. :—

$$M_F = 0.1071wl^2 = \frac{wl^2}{9.34} = \frac{250 \times (54)^2}{12 \times 9.34}$$

$$M_F = \frac{1}{6} rbd^2 = 200bd^2.$$

∴

$$bd^2 = \frac{250 \times (54)^2}{12 \times 9.34 \times 200}$$

$$= \frac{7290}{224}$$

$$= 32.5.$$

∴ 4 in. × 2 in. good enough for floor joists.

TRANSOMS.

Assume that the load of the floor joists is a distributed load on the transoms.

Use same diagram and factors as above for floor joists, the transoms being assumed broken at the centre pillar and overhanging at ends.

$$\text{Distributed load} = (4\frac{1}{2})^2 \times 4 \times 62\frac{1}{2} = 5060 \text{ lbs.}$$

$$M_r = \frac{wl}{9.34} = \frac{5060 \times 54}{9.34}$$

$$M_r = 200bd^2.$$

$$bd^2 = \frac{5060 \times 54}{9.34 \times 200}$$

$$= \frac{1365}{9.34}$$

$$= 146.2.$$

Following will do:—

$$\left. \begin{array}{l} 7 \text{ in.} \times 3 \text{ in.}, \\ \text{or twice } 7 \text{ in.} \times 1\frac{1}{2} \text{ in.} \\ \text{or } \text{,,} \quad 5 \text{ in.} \times 3 \text{ in.} \end{array} \right\} \text{ most convenient.}$$

To check strength of cantilevers.

Assume theoretical length.

$$\text{Distributed load} = \frac{4\frac{1}{2} \times 20.1}{12} \times 62\frac{1}{2} = 2120 \text{ lbs.}$$

$$M_r = \frac{wl}{2} = \frac{2120 \times 20.1}{2}$$

$$M_r = 200bd^2.$$

$$bd^2 = \frac{2120 \times 20.1}{2 \times 200}$$

$$= 5.3 \times 20.1$$

$$= 107 \text{ (which is less than } bd^2 \text{ for transom).}$$

UPRIGHTS OR PILLARS.

Height, 12 ft.

Max. load = 5060 lbs. = 46.2 cwt.

From Diagram, *Plate 57, Manual Field Engineering*, it appears that a pit prop $7\frac{1}{2}$ in. mean diameter is sufficient.

SIDES OF RESERVOIR.

To be made of corrugated iron 7 ft. x 2 ft. supported at the ends and centre.

As no data available an experiment had to be carried out on 7-ft. sheets.

There are two thicknesses of corrugated iron available.

Thin size over 6-ft. gap will just carry 218 lbs. distributed.

Thick " " " " " " " " 392 " "

Width of corrugated iron is 22 in.

Therefore for gaps of 3 ft. 6 in. and for strips 1 ft. wide

Thin size would carry 105.6 lbs. per foot-run or square foot.

Thick " " " 189 " " " " " " " "

The pressure of water at bottom of side is

$$= 4 \times 62\frac{1}{2} = 250 \text{ lbs. per square foot.}$$

If the sheets are laid lengthways along the sides it will be necessary to use along lower portion of side two thick sheets, along upper portion of side one thick sheet, as above figures do not allow for the corrugated-iron sheets recovering.

Supports to Corrugated Iron.—Calculate support as beam.

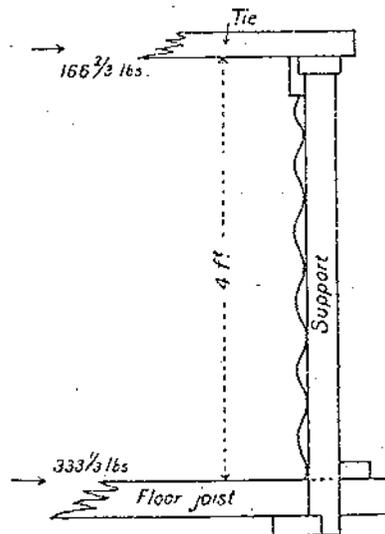
Load.—The pressure of the water on the sides is as the depth in feet per square foot = d , say.

The total pressure on side = $\frac{1}{2} \times 4^2 \times 62\frac{1}{2} = 500$ lbs. per foot-run.

The centre of pressure is $\frac{1}{3}$ of depth from bottom = $\frac{4}{3} = 1\frac{1}{3}$ ft.

The reaction on top of beam = 166 $\frac{2}{3}$ lbs. per foot-run.

" " " bottom " = 333 $\frac{1}{3}$ " " " "



Using calculus.

M_f at any point z ft. from top

$$\begin{aligned} &= 166\frac{2}{3}z - 62\frac{1}{2} \int_0^z (z-d) \cdot d \cdot dx \\ &= 166\frac{2}{3}z - 62\frac{1}{2} \Sigma z \left(\frac{zd^2}{z} - \frac{d^3}{3} + K \right) \\ &= 166\frac{2}{3}z - 62\frac{1}{2} \cdot z^3 \cdot \frac{1}{6} \\ &= \frac{590}{3} (z - \frac{1}{16}z^3). \\ &\frac{dM_f}{dz} = \frac{590}{3} (1 - \frac{3}{16}z^2). \end{aligned}$$

Equating to zero

$$z^2 = \frac{16}{3} = 2 \cdot 31 \text{ ft.},$$

i.e. max. M_f is 2.31 ft. from top.

To calculate M_f of beam treat this portion as cantilever.

$$\begin{aligned} \Sigma_{2.31}^0 M_{fs} &= 62\frac{1}{2} \int_{2.31}^0 (2.31-d) d \cdot dx \\ &= 62\frac{1}{2} \times (2.31)^3 \times \frac{1}{6} = 129 \text{ ft.-lbs.} = 1542 \text{ in.-lbs.} \\ M_x &= 200bd^2. \end{aligned}$$

$$\therefore bd^2 = \frac{1542}{200} = 7.71 \text{ per foot-run.}$$

\therefore for 3-ft. 6-in. run

$$bd^2 = 27.$$

Supports 4 in. \times 2 in. would suffice.

But for jointing corrugated iron, etc., take 4 in. \times 3½ in.

If calculated as cantilever.

Calculation for cantilever supports:—

$$\begin{aligned} \Sigma_4^0 M_{fs} &= 62\frac{1}{2} \int_4^0 (4-d) d \cdot dx \\ &= 62\frac{1}{2} \times 4^3 \times \frac{1}{6} \\ &= 1000 \times \frac{2}{3} \\ &= 666 \text{ ft.-lbs.} \\ &= 7992 \text{ in.-lbs. per foot-run.} \\ M_x &= 200ba^2. \end{aligned}$$

$$\therefore ba^2 = 39.96 \text{ per foot-run,}$$

i.e. 5 in. \times 1½ in. " " "

or 6 in. \times 1½ in. " " "

\therefore for 3-ft. 6-in. length require 6 in. \times 4 in.

Footings of Cantilevers.

M_f on cantilever = 7992 in.-lbs.

Dist. between footings = 4 in.

\therefore pressure on lower footing = 2000 lbs.

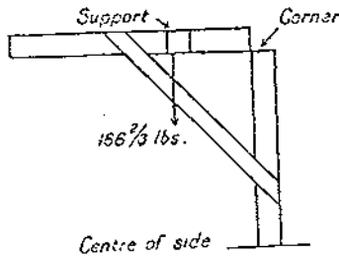
" " upper " = 2500 lbs. = 22½ cwt.

From p. 84, *Military Engineering*, Part IIIA., and allowing factor of safety 3 and that upright may come $\frac{1}{3}$ distance between joists, *i.e.* allowing for 34 cwt. it appears $\frac{4}{3}$ -in. grooved wire nails required to resist pressure of support at footing. Assume that support comes on top of a floor joist then strength of ribands required at footings will be

$$bd^2 = \frac{2500 \times 24}{4 \times 200} = 75,$$

i.e. 6 in. \times 2 in. will suffice about, --
 or two 4 in. \times 2 in. " " "
 or 5 in. \times 3 in. " " "

Top Rail of Side of Reservoir.—Calculate strength so as to allow for holding support on underneath side.



$$M_{\pi} = \frac{2}{3} \times 21 \times 166\frac{2}{3} = 2330 \text{ in.-lbs.}$$

$$bd^2 = \frac{2330}{200} = 11.65,$$

i.e. 4 in. \times 1 in. would suffice,
 but use 4 in. \times 2 in.

FELLING OF FACTORY CHIMNEY.

By CAPT. J. F. HASELDINE, R.E.

A FACTORY chimney was very badly cracked on all sides and for all the upper portion of its height. Some of the cracks had been filled fairly recently with cement mortar, and in all such cases the bricks had s ill further opened showing that the decay which had set in, had not been arrested. The traffic in the neighbourhood had increased, heavy motor lorries on the adjacent road, and a new broad-gauge railway passing the entrance to the yard set up considerable vibrations and earth tremors; it was consequently considered advisable to fell the chimney and so obviate any chance of it coming down unexpectedly. Permission of the owners was obtained.

The only clear ground on to which the chimney could be felled was in the direction of the entrance to the yard, and even on this line there was not sufficient length to throw the whole height of the stack in one operation; the yard entrance had buildings on either side and the clear gap between these buildings was only about 35 ft. It was consequently decided to fell the top 66 ft. 6 in., as a first measure, and the chimney—the total height of which was 130 ft. 6 in.—was prepared for demolition as shown on attached Section.

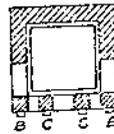
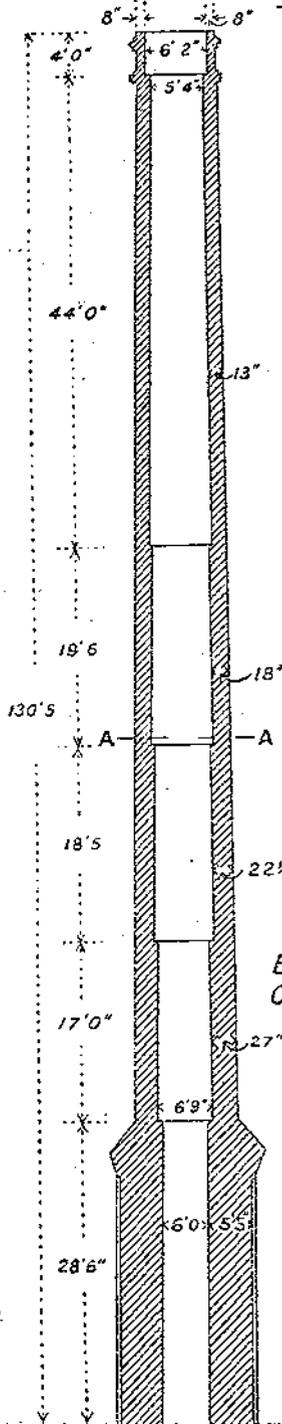
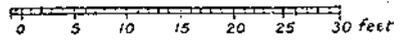
Foot irons were in existence on the inside of the chimney, and a stage was fixed inside just below the point marked "A—A" three holes about 15 in. high were cut in the wall on the side on which it was intended to throw the chimney, and openings also about 15 in. high were made on each adjacent side wall, the four brick pillars (the corner pillars each 18 in. square and the two intermediate pillars 15 in. × 18 in.) left by this operation, were calculated to carry half the brickwork above them with a factor of safety of four, the other half being carried on the back wall and the remaining portions of the side walls.

The charges were guncotton, and were calculated at half the amount laid down in the *Field Service Pocket Book*, it being considered sufficient to make the brick pillars fall and crumble and not necessary to blow them completely out. A heavy explosion might have caused the chimney to collapse in its vertical position, and for this reason the charges were placed outside the chimney thus avoiding any of the gases produced by the explosion causing undue pressure inside the shaft.

In order to lay the charges in the position shown B, B, C, and C, a light platform was fixed outside the chimney on cantilever baulks

CHIMNEY

Scale $\frac{1}{16}$ in = 1 ft (R.F. $\frac{1}{192}$)



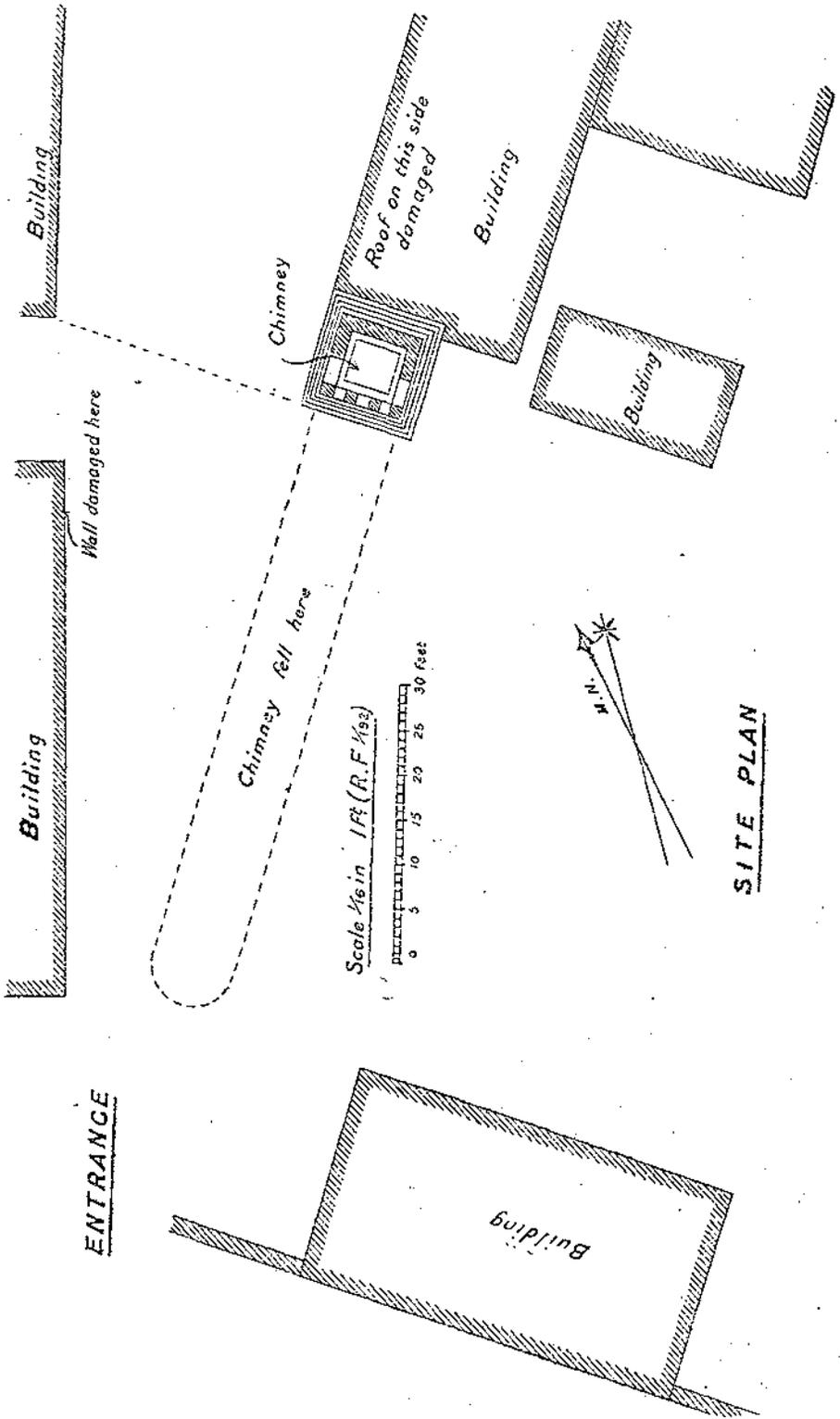
SECTION ON A.A

shewing brickwork cut away and charges in position.

CHARGES

- B.B. Corner Piers 1½ slabs each
- C.C. Centre Piers 1 slab each

VERTICAL SECTION



pushed through the holes which had already been made, and the officer laying the charges crawling out through one of these holes. Just before the charges were fired the openings in the side walls were continued towards the back wall until each extended to a point 3 in. over the centre line of the chimney; this was done to ensure the stack falling as soon as the pillars in the front wall failed. The charges were fired electrically, the leads being carried to an exploder some 100 yards to the flank.

Immediately after the explosion occurred the chimney started to lean over in the required direction, and it was not until it had gone over about 20 degrees that a large piece slid off the back wall, and smashed in one side of the issue room roof—this was expected. The chimney fell in the space between two buildings and except for a hole about 3 ft. square in the weather-boarded wall of one of them no damage was done.

REVIEWS.

THE LIFE OF SIR COLIN C. SCOTT-MONCRIEFF.

*Edited by his Niece, MARY ALBRIGHT-HOLLINGS.—(12s. net.
Murray, 1917).*

THIS book is the work of many hands. Much of it is drawn from Sir Colin's own Reminiscences and letters, but contributions have been made by relatives and by friends who were associated with him in India, Egypt, or at home. Among these may be mentioned his nephew, Sir George Scott-Moncrieff, Sir William Willcocks and Sir J. M. Dodds, his successor at the Scottish office. The Editor's part has been to "cement the whole together," and she has done this with the greatest care. A composite biography can never be quite as pleasant to read as one in which the materials have been fused together by a single author. Reptitions are inevitable, and the order of time is not always observed. The mere passing of the pen from one to another makes a break in the flow of the narrative. But biographers sometimes give us portraits which, however vivid, are not faithful, being coloured by their own personality. The reader who will go patiently through this volume from end to end will feel that he has gradually become possessed of a finished and trustworthy portrait of a most admirable man.

The October number of the *R.E. Journal* contained a Memoir of Sir Colin which makes it needless here to follow the steps of his career. But we want to know, not only what he did, but what he was, and this knowledge we get with unusual fulness from his own letters. He was a good letter-writer from the descriptive point of view, and he gave graphic accounts of the places he visited and the work on which he was engaged. But he was also unreserved about his own thoughts and feelings in writing to those who were dearest to him, who were often at home when he was abroad. Apart from what his friends tell us of him, his letters make the reader much more intimately acquainted with him than is usual with men of action.

In 1876, when engaged on irrigation work in India, he wrote to Gordon offering to serve under him in the Sudan. He said:—"I cannot pretend to any constructive talent, or scientific knowledge, and I am most ignorant of mechanical engineering, but I have been lucky beyond all my contemporaries in the Public Works Department. . . . I have not had an hour's illness for about nine years, although I have had a good deal of exposure, and I stand heat well. I am no sportsman, and know nothing of horses, but don't mind a ride of 100 miles. I have always been used to hard work. It is no wish to better myself in a money point of view that prompts my writing to you. . . . I

don't think you would find me above any work you thought fit to put me to." Gordon's answer was that his own stay in the Sudan was too precarious for him to invite anyone to join him, and that it was hopeless work that he was engaged on.

Sir William Willcocks, who served under him both in India and Egypt, says of him :—" Though Sir Colin was not an original engineer, he was as sound in his professional knowledge as he was full of experience. In criticizing reports, rejecting unreliable features, and grasping the really essential points of irrigation projects he was at his best. This soundness of view and grasp of his subject resulted in his being extraordinarily courageous. . . . Indeed, his whole tenure of office witnessed a succession of bold enterprises, every one of which was carried to a successful conclusion."

Sir J. H. A. Macdonald, who knew him from boyhood, says :—" He was always the same bright, unassuming, kindly man, earning respect and affection whether from those of his own race, or from the more dusky tribes among whom so much of his life was spent." In the words of Lord Milner with which the volume closes :—" He leaves a fine record of work and will be remembered as one of the best beloved of men."

E. M. LLOYD.

PAGES D'HISTOIRE, 1914—1917.

Published by the Librairie Militaire Berger-Levrault, 5—7, Rue des Beaux-Arts, Paris.

(Continued from *R.E. Journal* for December, 1917).

Chapter III. is entitled *Contre-projets de Paix Allemande* (1915), and throws light on the cross currents in Germany, which, in 1915, were forming whirls and eddies in the stream of views on the subject of War aims and peace negotiations.

This chapter is subdivided into six parts, the first of which bears the title *Le Mémoire de la Nouvelle Patrie*. In it we learn that, towards the end of 1914, Count von Tepper-Laski, a retired cavalry captain, formed a society in Berlin the membership of which was open to men and women of Germany who, although professing various and different political and religious creeds, were yet united in the view that they should set themselves to work in common accord as regards the new duties imposed on the German people by the European War; duties to consist in the encouragement of every measure calculated to promote agreement between civilized peoples in matters of a political and of an economic nature. The society appropriated the title of "The League of the New Fatherland" to itself and numbered among its members men well-known in various walks of life. On the membership list appear the names of Professors Brentano, of Munich, Delbrück and Liszt, of Berlin, Schücking, of Marburg, Bruckhausen and Lammasch, of Vienna, Toennies, of Kiel, of Quidde and Wehberg, the Publicists; of Rudolf Goldscheid,

President of the Austrian "Monists"; of Count von Arco, the Electrical Engineer, and of many well-known Liberals. At the beginning of its career the League endeavoured to link itself up with people in foreign countries possessing sympathies similar to its own. The Swiss Pacifist, Otto Nippold, of Berne University, entered into correspondence with the League, and the British Union of Democratic Control is said to have also done so. The annexationist proposals of the Economic Associations, to which reference has been made earlier in this review, had no place in the programme of the League of the New Fatherland; indeed, this League was opposed thereto and towards the end of June, 1915, it drew up a memorandum refuting the annexationist proposals and sent a copy thereof to the Imperial Chancellor and to the members of the Reichstag. The following is a summary of the contents of the Memorandum in question:—

The Memorial of the Economic Associations contains dangerous ideas against which the League enters a protest.

1. *To aim at securing peace by the annihilation of the enemy is to proceed on a wholly wrong principle.* In history many examples are to be found of the determination with which a people resist the attempt to crush them completely out; e.g. Germany, a century ago, France after 1870—1871, Russia since 1904—1905, etc. Moreover, it is from the practical point of view impossible really to annihilate a nation.

2. *The Annexationist Proposals.*—These proposals involve a transfer to Germany of 12,000 square miles of territory with a population of $7\frac{1}{2}$ millions in Belgium, of 8,000 square miles of territory with a population of $3\frac{1}{2}$ millions in France, of 32,000 square miles of territory with a population of 5 millions in Russia, that is to say 52,000 square miles of territory in all would be added to the German Empire, and its population of 67 millions would be increased by 16 million aliens of various races; the dangers connected with the adoption of such a course are too apparent to need discussion. The suggestion to dispossess these aliens knocks the bottom out of the case for annexation. The only effect these proposals are likely to have will be the strengthening of the coalition against Germany. Moreover, Bismarck himself recognized the harm that was done by his own annexationist policy and in later times condemned the same.

3. *Annexations in the East.*—The annexations in this region cannot provide for holding the balance even between the industrial West and the agricultural East, since the West is the most densely populated and the most industrial region of Europe; moreover, Poland is fast becoming an industrial country. It is altogether untrue to assert that the Baltic Provinces desire incorporation into the German Empire—only some 200,000 out of $2\frac{3}{4}$ millions of the inhabitants of these Provinces are German.

4. *Annexations in the West.*—The economic and commercial advantages which, it is claimed, would accrue from the proposed annexation in the West form a most debatable subject. The greater part of these advantages could be obtained by Treaty and without annexation. It would be an unpardonable crime to prolong the War a single day in order to satisfy these demands.

From the maritime and military point of view, the annexation of Belgium would only be of value for the purposes of an attack on Great Britain. The latter country will not fail to grasp the meaning and intent of such an act; in consequence Germany will only let herself in for new wars. It is useless talking of depriving France of the fortified zone from Verdun and Belfort, which is still unconquered. Even if Germany did get it, France would prepare some other strong line of defence; indeed, Germany would only be inaugurating a reign of terror throughout the universe by adopting such a course. On the other hand, small rectifications of the Franco-German frontier could be obtained by the terms of a Treaty, in which a stipulation could be inserted providing for the French frontier fortifications to be razed to the ground.

Politically, the annexation of Belgium or any part of France would only saddle Germany with the governance of hostile peoples. It is an error to suppose that Germany could, in Belgium, set the Flemish people against the Walloons; further, the inhabitants of N.E. France are noted for their patriotism. Should Germany annex Belgium she will have the whole world against her, even those who at the present time may be favourably disposed towards her.

5. *Conclusion.*—The incorporation into the German Empire of 16 millions of the enemy is an act against the interests of that Empire and its people; it will constitute an element of weakness and not of strength. Great Britain will never be a party to a Treaty of which any clauses provide for the proposed annexations, unless she is first utterly crushed. Such a Treaty, were it possible, would only keep alive the present coalition against Germany and would inevitably lead to another colossal War. The present conflict has already imposed heavy financial burdens on Germany, to prolong it for the purpose of the annexations in question only means that German soldiers are being called upon to fight in order to increase the heavy taxation already falling on the German people.

In order to satisfy the craving for power a heavy price would have to be paid, and even this price when paid would only place Germany in a position of fresh insecurity and involve her in new sacrifices. The great majority of the people, who have already suffered much by this War, are clamouring for a peace the conditions of which they will never allow to be such as to serve the petty interests of a class at the expense of those of the whole nation.

6. *The German Peace Programme.*—Herr Dernburg in an address given in the United States of America recently spoke of two principles: that of the *open door* and that of the *Liberty of the Seas*—the *open door* in order to ensure free play in the Universe to the economic forces of Germany; the *Liberty of the Seas* in order to provide Germany with communications to her Colonies and to foreign ports, in times of War as well as in times of peace—thus terminating the tyranny of Great Britain on the seas.

The League does not contest the point that the policy of the *open door* and that of the *Liberty of the Seas* should be provided for by clauses duly incorporated in the Treaty of Peace, but that International Law is bankrupt is a proposition that the League does most emphatically deny. It is hoped that the essential feature of the peace,

which is to follow at the conclusion of the present War, will not consist alone in greater efforts being put forth for the development of International Law, but will also consist in Germany lending her aid to the attainment of this end.

Germany can and must use the territories of which she is now in possession as pawns for the purpose of safeguarding her political position and of obtaining compensation. Germany's aim should be principally directed towards the acquisition of colonies, the security of her frontiers (from a military point of view), the payment to her of a War indemnity, the surrender to her of naval ports and coaling stations.

It is wrong to speak of a premature or of a weak peace. The chief obstacle, in the two camps, to the opening of peace negotiations is that the belligerents are in each case afraid that they may be thought to be suffering from War weariness. The petitioners hope that the Imperial Chancellor will seize the first opportunity to pave the way for peace negotiations by disavowing the annexationist programme contained in the Memorial of the Economic Associations.

The second part of the third chapter is entitled *Le Mémoire des CXL. Sommités*; in it a reference is made to the individual views of a few of the members of the League of the New Fatherland. It is suggested that all the members of this League are not in agreement with the whole of the arguments and conclusions contained in the memorandum of the League, whereof a summary has already been given earlier in the chapter; attention is particularly called to the views of Professors Brentano and Delbrück.

In the spring of 1915, two societies were founded, each with the title of the *Economic Austro-German Association*, with headquarters in Vienna and in Berlin respectively. These societies, in concert with other Leagues, carried on an active propaganda urging a Customs Union between Austria and Germany; at the end of 1915 a manifesto, signed by 800 Professors belonging to German Universities and German High Schools in Austro-Hungary, was issued by them advocating the closest union between the two Empires. Brentano supported the proposal with all his authority; not only did he favour a fusion of Austria with Germany in the interests of a vast economic development, but he further attempted to show that the act of forcibly annexing territory does not amount to conduct incompatible with the principles of democracy. His argument is as follows:—

The strength of a nation resides in the Union of the State and of its people. Every element producing discord is a source of weakness. It is for this reason that Great Britain must grant Home Rule to Ireland and that Russia must solve the Polish question by granting autonomy to Poland. But conversely, particular groups within a State are not entitled to choose their own form of Government nor to secede from the established Government. Likewise, an annexation of territory does not require the consent of the population annexed therewith to legalize it. The annexing of territory cannot be considered as an act contrary to the tenets of democracy if it be remembered that, in the political domain, the determining factor which justifies the adoption of a particular course must always be whether the greatest good to the largest number

will result. It was without any sense of pleasure that Germany in 1870—1871 annexed Alsace-Lorraine; the Alsations and Lorrainers, however, secured thereby the protective influence of 40 million Germans, a population twenty times as great as that of their own Provinces. The annexation of Alsace-Lorraine was therefore justified.

Again, to-day, it is necessary that Germany should annex all the territory necessary to make her frontiers safe against fresh attacks. Lithuania and the Baltic Provinces are extremely fertile regions which only await a German population and German capital to stimulate intensive production therein. Every one who has studied the question of German agriculture fully realizes the advantages likely to accrue from a union of the Baltic Provinces with the Empire and the colonization thereof by a German population.

The logic in Professor Brentano's argument may, not appeal to the sense of reasoning of the ordinary Britisher, but this need not prevent the latter from fully understanding the Professor's War aims as set out above.

Professor Hans Delbrück, who teaches modern history at the Berlin University, we all know enjoys a very high reputation in his own country. He was the inventor of the phrase: "Blest be the hand that falsified the Ems despatch!" He is the Editor of the *Preussische Jahrbücher* and he made full use of his prerogative when publishing the propaganda of the *League of the New Fatherland* in his publication, by toning down the views contained in the statements issued by the League where he considered this to be necessary; he also got into touch with persons who were likely to be suspected neither of Teutonic heterodoxy nor of hostility to the Imperial Government, among them being numbered the notorious Dernburg, Dr. Paul Rohrbach, Prince Henckel von Donnersmark, Major von Parseval, Frederick von Siemens, Wilhelm Kahl and others. A memorandum was drawn up by Delbrück and his friends to which 141 signatures were appended; it was forwarded to the Imperial Chancellor on the 9th July, 1915. In this memorandum it is stated that Germany entered upon this War in order to preserve her existence and her national unity, and in order to protect her national development and not with any idea of conquests at the back of her mind. On the conclusion of peace Germany must pursue that course which will secure for her the attainment of the ends enumerated by the signatories. The memorandum continues: "Petitions have been presented to Your Excellency in which aims different to our own have been incorporated. We consider it our bounden duty to oppose those aims with all our strength and to avow openly that, in our opinion, their realization would be a most serious political error and likely to lead to serious consequences, tending fatally to weaken the German Empire rather than to strengthen it."

The signatories of the memorandum declare that they are opposed to the incorporation into the German Empire or annexation thereto of autonomous peoples and wish such schemes to be officially disavowed. According to them the German Empire, being the outcome of the idea of national unity and of national homogeneity, is able only very slowly and incompletely to assimilate foreign elements; they do not desire any

changes to take place in the fundamental characteristics of the Empire, nor do they wish to see Germany's present character of a National State destroyed. But steps must, it is suggested, naturally be taken to ensure that the territories which will have to be vacated by Germany, according to the conditions of a Treaty of Peace, shall not become a wall of defence for her enemies, nor pass into the hands of one of her rivals. They place on record their conviction that the War will end in a complete victory for Germany and that the German people will demand, as some return for the magnificent acts of heroism, the great sacrifices and the immense sufferings of the whole nation, some recompense in proportion thereto, if indeed this were possible.

The greatest reward which Germany can obtain will consist, in their opinion, in the certainty that she need not fear even a whole world of enemies and in the proof of her great power, which constitutes an example without precedent to the present and future generations of other nations. The German people can only conclude a peace which will afford sure guarantees for their strategic needs, for the political and economic interests of their country, and for the unhampered activity of their power and their spirit of enterprise on the free seas as well as within the limits of the Fatherland. The signatories are confident that His Excellency, the Imperial Chancellor, or the Constitutional Authorities will obtain for Germany peace terms of the nature indicated in their memorandum.

Four months after the memorandum in question was forwarded to the Imperial Chancellor, Delbrück caused widespread commotion, owing to views expressed by him in an interview with an American journalist; what he had to say on this occasion was cabled from Berlin to New York and repeated thence to London and Paris. He stated that Germany hoped to obtain peace at once if President Wilson and the Pope would intervene as mediators, and that Germany's terms were practically as follows:—The cession to her of colonies such as Uganda, French and Belgian Congo as compensation for the evacuation of Belgium and the northern regions of France; an indemnity to be paid to Germany—Great Britain would have to bear this burden as the expenses to her of another year of War would exceed the price at which peace could be purchased then. He expressed the opinion that those who desired the annexation by Germany of Belgium were in the majority; naturally, the Baltic Provinces would remain in the hands of Germany, as a great part of the population thereof was German. For was it not the case that *Germany was out, in this War, to liberate the small nationalities?*

Delbrück claims to have remained faithful to the principles formulated by him at the beginning of the War regarding the peace terms to be exacted by Germany. The League of the New Fatherland was soon disavowed by its own members and came in for rough treatment at the hands of the Government. Its memorandum had been printed, but the Government seized the copies and forbade their circulation. In April, 1916, its secretary, one of the gentle sex, was put into prison, but released soon afterwards. The League of the New Fatherland has long since terminated its ephemeral career.

The third part of the third chapter is entitled *Les Mémoires des Pacifistes* and deals with the abortive attempt of the German Pacifists to propagate their views in the Fatherland. These well-meaning people formed a "German Peace Society," which had Dr. L. Quidde, a member of the Bavarian Diet, as President, and Pastor O. Umfrid, of Stuttgart, as Vice-President. This society, at a meeting held in Stuttgart on the 17th July, 1915, decided to publish a statement on the subject of Germany's peace terms in the next issue of the *Völker-Friede*, the society's journal. The military authorities intervened so that the number referred to was the last one to appear and the journal ceased to exist. In the statement which was published in the last number of the *Völker-Friede*, it was announced that an order imposing silence on the public prevented the Pacifists from making known their views freely. They however claimed that the peace terms should be submitted to *free discussion by a free people*. Under the existing circumstances, the Pacifists, it is stated, confine themselves to the entry of a protest, in general terms, against certain annexationist proposals. They are firmly convinced that such annexations instead of strengthening Germany will weaken her. In any peace that may be concluded they wish to see the strongest possible guarantees provided to render it lasting.

From May, 1915, onwards the military authorities of Munich adopted strong measures against Quidde, threatening him with the direst penalties, at the same time forbidding him to use the telephone, to attend any public or private meeting, or even to enter another's private residence; further, he was not allowed to publish any written matter nor to speak in public. Later, Quidde, from his seat in the Diet, put questions to the Bavarian Government regarding the military censorship and the opening of all his letters. The War Minister replied, treating him with the utmost contempt. However, the German Peace Society still continued to live and was permitted to hold a Conference at Leipzig, on the 6th and 7th November, 1915, without being interfered with.

It passed a resolution, the text of which was communicated to the Press, and, on the 1st December, 1915, it forwarded a memorandum to the members of the Reichstag, and probably also to the Government. In their memorandum the Pacifists state that they realize that the time has not yet arrived for the formulation of the exact terms of peace, but they call on the Imperial Chancellor to announce that Germany does not intend to act against the interests and rights of small States, and that she is prepared to pave the way for an international understanding such as will prevent wars in the future. To them two points of military moment, which must have a decisive influence on the peace terms, stand out clearly: (i.) The first is that neither side has won that complete victory which would enable it to *dictate* the peace terms. It is no longer a question of *victory* that is in issue, but that of *supremacy*, and (ii.) the second is that this *supremacy* has, in the judgment of all reasonable human beings, been *irrevocably won* by Germany and her Allies, in spite of the fact that the enemy is Mistress of the High Seas and has cut off Germany's sea communications. On the one hand, the enemy must be made to understand that Germany will have to be

compensated for the evacuation of the territories in the occupation of Germany's troops and those of her Allies. On the other hand, Germany and her Allies must recognize that *there can be no question of annexations by them which would touch the vital interests of their adversaries*; it is for those who may have to open peace negotiations, on Germany's behalf, to find the formula which will, without such annexations, provide the necessary guarantees for the protection of the military, political and economic interests of the Central European Powers and their Allies. The essential conditions from Germany's point of view are that her enemies shall accept the principle of the *Liberty of the Seas* and that of the *open door* so far as concerns the commerce of the Central European Powers.

The fourth part of the third chapter is entitled *Mémoire et Manifeste des Socialistes*, and in it we hear the voice of a political party which during the past three decades has been a sharp thorn in the side of the governing classes of Imperial Germany. The Socialists, at the beginning of the War, made it publicly known that they did not approve of the policy of conquests, and they made a stand against the annexationists. On the 25th June, 1915, Ebert and Scheidemann, acting respectively on behalf of the Committee of the German Social Party and the Committee of the Group representing that party in the Reichstag, addressed a petition jointly to the Imperial Chancellor, in which they entered a protest against proposals contained in the memorials of the Economic Associations and of the *Sommités*, and specially against the proposed annexation of Belgium. In this petition it is pointed out that, on the 4th August, 1914, the Social Democratic Party threw themselves in heart and soul with the cause of the German people as the existence and the independence of the nation were in jeopardy. It has played its part in the struggle against the world of Germany's enemies and it will continue to do so until such time as the safety of their country is secured and its enemies are ready to sue for peace. But they wish for a peace on terms which will permit Germany to live in love and amity with her neighbours; since it is only a peace of this kind that can provide guarantees that it will be lasting and thus best serve the interests of the German people. The rumours that attempts were being made to open up peace negotiations, it is said, brought some comfort to the hundreds of thousands who have passed through great sufferings. However, the annexationist proposals which had been divulged have already stimulated Germany's enemies to continue the struggle with unabated vigour, and can only result in the prolongation of the War. It is well-known, they tell the Imperial Chancellor, that the plans of conquest of Germany's enemies, to which publicity has been given, have only strengthened Germany's resolution to fight on.

Every assault on the independence and autonomy of a people carries with it the seeds of plants whose fruits are future wars and coalitions dangerous to Germany. After the unprecedented sacrifices Germany has been called upon to make recently, her most pressing requirement is an era of tranquillity in which she may recuperate free from all anxiety; this cannot be the case if the annexationist proposals are carried through, even if only partially. The armaments which Germany would have to

maintain in the future would result in a great waste of Germany's economic power.

The assertion that the German Empire is in need of additional territory beyond her Eastern and her Western frontiers in order to secure her economic welfare is contradicted by the wonderful economic development that has taken place, in recent times, within the limits of the present German Empire. And so far as Belgium is concerned, Germany's trade relations were extremely close. The annexation of Belgium, the petitioners feel sure, will only isolate Germany and consolidate and augment the coalition against her. Peace should bring to Germany not more enmities, but more sympathies.

On the 26th June, the day after Ebert and Scheidemann addressed their petition to the Imperial Chancellor, the Socialists published a manifesto in their papers, pointing out that the Committee of the German Social Democratic Party and the group representing this Party in the Reichstag had always unanimously combated the policy of conquests and of annexations; they protested strongly against the efforts being made to further annexationist schemes. These efforts, it is declared, only tend to postpone the peace so ardently desired by the whole German nation. In conclusion, it is stated: "It is not annexion that the people want; it is peace that they wish for."

The publication of this manifesto gave rise to polemics and ended in the suspension by the Government of the *Vorwärts*. However, the Socialist Party adhered to its original policy; it passed a resolution on the 16th August and drew up a statement containing its views on the 21st December, 1915. This led to a schism in the party. The Deputy Bernstein was the first to throw light on the attitude of the "minority" seceding from the Socialist party. He stated that French Socialists had, in times past, formulated the claim that the population of Alsace-Lorraine should be put in a position to decide their own fate. German Social Democrats, continues Bernstein, would, by resisting this French claim that nations may dispose of themselves, bring disrepute on their conception of democratic right.

The fifth part of the third chapter is entitled *Annexionistes et Expansionistes*, and in it we learn that those whose War aims consist in schemes of territorial aggrandisement are divided into two camps. It is stated that, at the time of writing, it was extremely difficult to follow the currents of public opinion in Germany, but that to all appearances the annexationists, with the semi-official support of the Government, had gained the upper hand. It is the divergence of views on the subject of the annexation of Belgium, and of other acquisitions in the West, that has brought two camps into existence. Some of those who take up an ill-defined attitude of opposition to the annexations in the West are not averse to the incorporation of the Baltic Provinces into the German Empire, nor to Colonial expansion, nor even to the creation of a "Central European Empire" stretching far out into Mesopotamia; indeed, the War aims of this camp would increase the territories under German sway to a far greater extent than would be the case if the proposals of the "annexationists" alone bore fruit. The opponents of the *annexationists* have been dubbed *expansionistes*.

Both annexationists and expansionists demand a rectification of the Franco-German frontier for strategical reasons; they harp on the now threadbare argument that it is necessary to secure Germany against *fresh attacks*. The language they use is vague but, in order to prove their case to their own satisfaction and to that of their compatriots, expansionists and annexationists at all times give prominence to *Germany's interests*, to *Germany's power*, to *Germany's future*; a few occasionally make a brief allusion to the superior claims of Liberty and to the respect due to the rights of other nations.

Briefly, *annexation*, as the term is understood in Germany, implies the incorporation into the German Empire of Belgium, the dismemberment and crushing out of France, the assimilation of Austria-Hungary, and the acquisition of parts of Russia; whereas *expansion* represents the policy which has for its aims aggrandisement of the German Empire on an indefinite scale in the East, by the assimilation of Austria-Hungary, by annexations in Russia, by developments in the Balkans, by the forming of an alliance with Islam and by various other territorial acquisitions; in either case Germany assumes the sceptre as Supreme Sovereign of the Universe. Evidently there is little to choose between the *annexationists* and the *expansionists*; both are **Pan-German**.

In a sense, the *expansionists* belong to that class in Germany which think most of the future and who at least have given the greatest play to their imagination; they have considered matters from a worldly point of view; they wish, by clever handling of the situation, to humour the susceptibilities of the *conquered* and of neutrals, in order to pave the way towards the re-establishment of cordial relations in the future. The *annexationists*, on the other hand, are of the earth earthy, and their horizon does not extend beyond the limits of Europe; they have concentrated their attention on the tracing of new frontiers on the two sides of the German Empire, in order to provide outworks to the existing ramparts.

In Bismarck's time the subject of a big or a little Germany, with or without Austria, was much on the *tapis*. By the expulsion of Austria, Bismarck adopted the policy of a little Germany. Annexationists and expansionists both claim that they are acting up to Bismarck's principles. They also claim to be disciples of the great Corsican; "History has made us the testamentary executors of Napoleon" was the announcement made at the beginning of the War by Professor Kuhn. The Consulate was expansionist, the Empire annexationist. Prussia grew into Germany by the annexations, beginning with those of the Great Elector, but it established its hegemony in Germany by expansion, thanks principally to the *Zollverein*. Bismarck, being a Prussian, was an annexationist, but, in 1866, he spared Austria, no doubt for some sound reason; in 1871, however, his hands were forced with regard to Alsace-Lorraine by the military party.

Expansionists and annexationists have maintained a discreet silence regarding their attitude towards Great Britain; evidently they have little expectation that Albion will be knocked out by a direct blow during the course of the present War. Of course, the proposals for the annexation of Belgium are indirectly aimed at Great Britain. Germany has

a long way to travel before she can accomplish the task imposed on her by Haeckel for the destruction of the British Empire. The German schemes of 1915 are less vast than German dreams of 1914; finally, when the time arrives for the score, which is being chalked up day by day on the big blackboard, to be paid it is more likely that it will fall to the lot of the Central European Powers and their Allies to foot the bill and not to that of the Western Powers and their Allies.

The sixth part of the third chapter is entitled *Déclarations Gouvernementales*, and in it we learn of the obstinacy with which officialdom in Germany has maintained secrecy concerning the War aims of the Imperial Authorities. In Germany public opinion is formed by order, but in spite of the memorials presented to the Imperial Chancellor calling for a lead from the Government on the subject of Germany's precise War aims the Kaiser's Universal Adviser has maintained the strictest reticence, although he has on several occasions made allusions to the War in his speeches in the Reichstag. On the 28th May, 1915, he spoke in a vague way of the guarantees that Germany would demand in order that her enemies might never again dare either severally or jointly to measure their sword with hers, and prophesied that the indissoluble union of the German races made it certain that Germany and her Allies must eventually triumph over a world full of enemies.

On the 19th August, 1915, the Chancellor stated that he would not emulate the hypocritical promises of Germany's enemies. He went on to express the hope that the occupation of the eastern frontier of Poland by German troops would give rise to a new era of progress in that country, and that thus would be wiped away the old rivalries between Germany and Poland; he further hoped that the latter country, delivered from the Russian yoke, was about to enter on a future offering great prospects of prosperity and of liberty, and one in which she would be able to fulfill her aspirations regarding a national life. Germany had set herself the task of governing the occupied territories in a manner that would secure for her the support of the indigenous population, that would result in smoothing out difficulties inseparable from War, that would provide a balm to the wounds made by Russia. If Europe wished again to enjoy days of peace, her hopes in the matter could alone be realized by making Germany strong and firm. The British policy of the "balance of power" must disappear. Germany must enforce the *Liberty of the Seas* not only for her own benefit but also for the protection and safety of all peoples; not for the purpose of exercising a tyrannical domination, as Great Britain has done, but in order that the deep waters may be freely and equally accessible to all nations. It is not Germany that is a menace to small States; indeed she is and intends to remain the strong bulwark of peace, of liberty to the weak as to the strong. Germany has at no time sought to dominate Europe. Her ambition has only been to acquire the first place in the peaceful competition between nations. The Chancellor concluded his speech by stating that it was the intention of Germany to fight on until the true culprits were reduced to that frame of mind which would induce them to live at peace with other nations, until the ground had been levelled on which to lay the foundations of a New Europe, freed from the intrigues

of France, the megalomania of Russia and the tutelage of Great Britain.

On the 9th December, 1915, the Chancellor again rose in his place ; on this occasion he informed his audience that he had in his previous speeches given an outline of Germany's War aims and he could not on that day enter into the details. It was impossible for him to state what guarantees the Imperial Government was likely to demand for example on the question of Belgium. But Germany's enemies must be sure of one thing : the longer and the more obstinately they continued the War, the more exacting would Germany be in the matter of guarantees. Neither in the East nor in the West would Germany permit her present enemies to establish conditions enabling them to renew their attacks on her. " It is," said the Chancellor, " well known that the loans to Russia authorized by France are raised expressly for the purpose of remodelling the fortresses of Poland and for the construction of railways for use against us. It is also known that Great Britain and France look on Belgium as a frontier region from which an attack can be launched against Germany. We, on our side, must adopt measures to make it equally possible to secure a triple development, that is to say, political, military, and economic." In closing his speech the Chancellor stated that " the conflict has remained, so far as the German Government is concerned, what it was on the first day, and what it has not ceased to be in all our manifestations ; a defensive War on the part of the German people."

Chapter IV. is entitled *Discussions sur les Buts de la Guerre* (1916) ; it is subdivided into eight parts. The first part is entitled *Nouvelles Déclarations Gouvernementales* and in it we get some idea of the effect produced in Germany by the prolongation of the War. The British check in Mesopotamia (April, 1916) and the disaster to Roumania (September to November, 1916) were largely compensated for by the Russian advance in Armenia and the striking offensive carried out by Brusilof (June to August, 1916), by the Italian successes and above all by the fighting at Verdun and on the Somme. The German people were, however, not prepared to admit that victory was further from them ; they were holding out, but they had become nervous ; they had begun to quarrel between themselves ; the schism in the ranks of the Socialists had accentuated itself ; the Chancellor was attacked publicly ; an epilogue was pronounced on his sibylline utterances ; it was claimed and it was also denied that he had had annexations in mind when he only spoke of *guarantees* and repudiated *sentimentality* ; the Chancellor seemed at times to have entirely lost the confidence of those whose opinions had value ; the Kaiser kept his own counsel with the strictest reserve, and the discussions on War aims degenerated often into polemics fit only for home consumption.

The meanwhile, the Imperial Chancellor maintained his normal attitude of reticence regarding the official War aims of the Government. Once only, on the 5th April, 1916, did he enter into any explanations ; an occasion on which he indulged in a bitter attack on the War aims of the Western Allies, aims which he deliberately misrepresented. In certain quarters the views that the Chancellor had expressed were held to be covered by the formula : *Guarantees in the West, annexations in*

the East. Later, on the 5th June, the Chancellor produced the theory of the "War map" as a basis of determining the conditions on which peace must be negotiated, but he continued to harp on the theme that Germany must be protected against every possibility of attack in the future.

The second part of the fourth chapter is entitled *Éclaircissements et Commentaires* and deals with the attempts made to throw light on the real meaning of the Chancellor's official utterances.

The Imperial Chancellor is but a glorified clerk to the Kaiser; a constitutional fiction allows him to be criticized, whereas the Kaiser's name must not be dragged into debates. By a Prussian tradition the Right constitute the free lances of politics in the German Legislature, rather than do the Left. To the former party, the Government seemed to have adopted too weak an attitude both in relation to peace terms and the conduct of the War; in consequence they attacked it and with some virulence. The attacks on the Chancellor had their origin in the supposed weakness shown, but were no doubt persisted in owing to the reticence of the Government. The latter party, on the other hand, continued to examine and to explain, though not with one accord. For instance Professor Quidde, the President of the "German Peace Society," who, as we have seen earlier, was considered a dangerous person by the authorities, addressed an open letter to Professor Ruysen of the French Peace Society containing comments on the Imperial Chancellor's statements.

In reading this letter one obtains the impression that Quidde is a most amiable and benevolently-minded German; but Ruysen, in his reply, states with fairness that as does the Imperial Chancellor so also does the German pacifist take, whether he avows it or not, the "War map" as a basis for his peace terms. Ruysen further points out that two forces dominate Quidde's argument: "Reasons of State and the *fait accompli*," so that "in spite of his liberalism and of the undeniable openness of his mind, he is after all a good German."

As an example of the line taken by another commentator on the Chancellor's speeches an extract is quoted from an article entitled "Freie Meere" (the Free Seas) by Professor Gerhart von Schulze-Gaevernitz, of Friburg University. In the article in question the learned Professor declares that "Germany is fighting to secure the *Liberty of the Seas*, and consequently for humanity. Aye! even for France. Germany does not aspire, on her own behalf, to a naval preponderance which she would not have the strength to maintain, but she seeks to create an equilibrium between the several naval Powers, an equilibrium in which she will be equal in rights and in strength to the strongest Power." It is by this means that Germany hopes to secure the existence of the future generations of her people. Further, Germany declares herself opposed to that state of affairs which permits a single Power to monopolize, at her sweet will, colonies whose products are prime necessities to the world at large, and to distribute the same according to her caprice among her favourites and to the detriment of others. Colonies are by no means a luxury, rather are they a vital asset to industrial States and to the society of old Europe, whose superficial area

is limited. Germany, being an industrial State, claims for herself territories sufficient in extent and not too far removed from her geographically. Belgian Congo fulfills the twofold conditions, without seriously conflicting with the Colonial interests either of France or of Great Britain. From the economic point of view, Antwerp must remain in German hands. This port is the true and only German harbour in the North Sea. There is not and there can never be any question of its ever being returned to Belgium.

The third part of the fourth chapter is entitled *Considérations sur la "Principale Ennemie"*; in it we learn how difficult a problem the Germans have found it to discover which country is their chief enemy: Great Britain or Russia. Some there are that denounce Great Britain; to them Russia's form of government, alone like that of Prussia of all others in Europe, represents the true principles of authority. The Germanophil party has not lost all influence in Russia; a separate peace with that country is within the range of possibilities. This affords a good reason for not proceeding too far against Russia; but at the same time Poland must be granted autonomy. Such at all events are the views of Professor Otto Hoetzsch, of Berlin University, the Conservative publicist.

Rohrbach, on the other hand, has repeatedly called attention, in numerous articles and brochures, to the Russian Peril, the despotism of Czarism, and the dangers to *Kultur* arising from the continuous growth of the population of Russia. Having satisfied himself that Germany cannot now hope for complete victory on both fronts, Rohrbach recommends that an attempt should be made to arrive at an understanding with Great Britain, whilst Germany's greatest effort should be developed against Russia. Delbrück, whose views coincide largely with those of Rohrbach, in a striking article entitled *Divide* (*Tag* of the 21st July, 1916), which has caused great discussion in Germany, points out the manner in which the Fatherland could secure peace by adopting the course suggested by Rohrbach.

Delbrück, in his article, expresses the opinion that "the general situation shows that it would be more advantageous to seek compensation in the East. In order to win over Russia, Germany would be obliged to renounce her schemes against Poland and Courland and to sacrifice Turkey also; these two eventualities may not be considered as within the range of practical politics." He proceeds to argue that strictly speaking Germany should seek her greatest compensations in the West; but the complete subjugation of the hostile populations in this region would require the use of exceedingly large numbers of troops and she would have to borrow Russian police methods to effect her purpose. The adoption of the latter course might bring Europe to ruin or at least lead to a series of unfortunate incidents without end. For this reason, says Delbrück, it will be wiser for Germany to adopt the very opposite policy and to drift into agreement with her Western adversaries. A reconciliation with France may not be possible; for even if Alsace-Lorraine were to be handed back to France there is no saying but that the Chauvinistic elements in that country might not also demand the whole of the left bank of the Rhine. However, if the

former frontier of France were to be restored, Germany need apprehend no serious danger from her Western neighbour, who will have been too exhausted by the War to be able to do her harm.

Great Britain will, of course, demand the evacuation of Belgium. By evacuating this country Germany would certainly lose a geographical position of very considerable value from a military and naval point of view. The invention of the submersible has, as the experience of the present War shows, completely altered the situation and it is the submarine that will guarantee the *Liberty of the Seas*, whatever may be the terms of the Treaty of Peace. He concludes: "Let us say so openly and squarely; the truly effective guarantee, for which so much search has been made, is the submarine."

The fourth part of the fourth chapter is entitled *Déclaration de la Ligue de la Hanse* and in it we are put in possession of the collective views of the Hansa Bund, a powerful society the membership of which is composed of men prominent in finance, commerce and the law. At the time that the original article was written Dr. Jacob Riesser, of Berlin University, was the President of the Hansa Bund. It had been a subject of remark that the Hansa Bund had abstained from participating in the memorial presented by the six great Commercial Associations or Leagues in 1915, to which reference is made in the first part of the second chapter of the volume under review, but, in August, 1916, the Bund deemed the time propitious to deliver itself. The fact that Riesser and those who were associated with him were, in the period prior to 1914, advocates of War cannot fail to add weight to the views expressed in the manifesto of the Bund. In the document prepared by this body it is stated that its Executive Committee had considered the subject of War aims at a meeting held on the 15th September, 1915, but did not make the resolutions adopted on that occasion public; the War being still in progress, it was decided to exclude from the resolutions in question all reference to War aims except one in very general terms.

The Bund, whilst expressing the conviction that Germany does not lay claim to the exclusive domination over land and sea at the conclusion of the world War, nevertheless insists that the principal aim of their country must be to secure the Liberty of the Seas, in her own interests as also in that of all other States. This places its aims in accord with those of the majority of the German people who, it is stated, unanimously approve of the policy of territorial expansion. It demands the restitution to Germany of the Colonial Empire which has been lost to it during the War, the payment of a suitable War indemnity and also of compensation in satisfaction of all the other claims in respect of violations of International Law committed to the detriment of the interests of Germans settled in foreign lands.

The Bund expresses the hope that an agreement may be arrived at as to the manner in which Germany may be strengthened and her territories and power augmented, objects the attainment of which has been at all times recognized throughout the Empire as of paramount importance. It desires that all differences on the subject may be composed and that the unification of the various points of view may be brought about on the lines indicated in the Bund's manifesto.

The fifth part of the fourth chapter is entitled *Le Manifeste des Sept Professeurs Berlinois* and gives us the views of seven illustrious Professors of Berlin University, who represent, so to speak, the patriotic Intransigentes of Germany. The names of the Professors concerned are Adolf Wagner, an economist; Otto von Gierke, a jurist; Dietrich Schaefer, a historian (*vide* notes on Chap. I., Part IV.); Ulrich von Wilamowitz-Moellendorf, a philologist; Wilhelm Karl, a jurist; Eduard Meyer, a historian, and finally Reinhold Seeberg, a theologian. Fuller particulars concerning these persons are given in the volume under review. The following is a brief summary of their manifesto: The second year of the War has been even richer than the first in German successes. The question of a coming peace is occupying the attention of the people in all quarters of Germany. Germans have ever been a peacefully-minded nation. That the German Empire should have been built up by the sword is a fate which the necessity of history has imposed upon the nation. Once created the German Empire has wished for peace alone and the necessary space for the pursuit of honourable occupations which could only prosper whilst conditions of peace prevailed. This was denied it. Thirst for vengeance, greed for conquest, the industrial jealousy of her neighbours have compelled Germany to resort to war in order to save herself and the neighbouring Empire of her Ally from mutilation and dismemberment. Germany is now fighting for an honourable peace; she did not enter upon the struggle with thoughts of conquest in her mind. Having drawn her sword, Germany cannot return it to its sheath until she can be assured of a peace, the terms of which her enemies must be compelled to observe. Such a peace renders an increase in Germany's power and an extension of her territories essential and imperative. Guarantees to this end are required and Germany's enemies having refused to provide the same, she cannot discuss peace terms.

The sixth part of the fourth chapter is entitled *Le Comité National Allemand pour une Paix Honorable* and deals with the propaganda of the Committee founded in July, 1916, for the purpose of securing an honourable peace. In an appeal sent out on the 19th July, 1916, the Committee stated that its object was to bring together patriotic Germans of every party with the intention of pursuing a policy the aim of which would be to secure a peace consisting, so to speak, of the mean of the aims of the two extreme groups—the peace-at-any-price party and the Pan-Germans.

Among those whose support was obtained by the Committee were Karl von Wedel, a former German Ambassador at the Courts of Vienna and of Rome; Thyssen, the metallurgist; Heineken, of the Nord-deutscher Lloyd Company, and others drawn from the professional, commercial, and official classes. Being a third party between two extremes, it was attacked from the left and the right. It was said that the Committee was really acting under the promptings of the Imperial Chancellor, who had confided to it the mission of announcing semi-officially the programme which the Government had hitherto refused to publish. An announcement was issued by the Committee that conferences would be held simultaneously in 80 towns on the 1st August, 1916, the anniversary day of the declaration of the War. However,

by degrees the number of the towns in which meetings were to be held was reduced to 38. In Berlin, von Harnack was the speaker. The celebrated manifesto of the XCIII. German intellectuals published in 1914 was said to have been drawn up by him. He opened his speech by stating that the reason that the Germans were sure as to the future was because they had confidence in the Almighty, in their Army and in their Government. He then proceeded to speak of War aims.

He pointed out that it was idle and dangerous, whilst a War was still in progress, definitely to lay down peace terms. But an intelligent people could not fight without some knowledge of the end in view, so that a general indication regarding the same was necessary to create the appropriate stimulus. There were some who held the view that Germany's enemies had fallen on her to crush her, and that it would be enough if she were victoriously to repel the attacks. Others, on the other hand, were of opinion that prior to the War Germany was being hemmed in and strangled; these urged that she should tenaciously hold on to all she had got into her grasp from the Somme to the Beresina and that peace should only be concluded on conditions which would automatically and permanently guarantee to Germany protection and liberty on the seas and on land. Von Harnack opines that there is much that is right and much that is wrong in these two theses. "We are surrounded," he says, "by a world of enemies and the fact alone that we have beaten them constitutes a factor of historical importance." A War such as the present one cannot end on the basis of the *status quo ante*, but Germany can and must proceed onwards towards the ends she has had in view.

He reminded his audience that Germany had almost completely lost all her Colonies and she must in consequence reconstitute her Colonial Empire; the stronger position which she had acquired in Central Europe could not be considered as an equivalent set-off. It was not to be expected that the Colonies would return to Germany automatically, she must agree to make sacrifices in Europe to get them back.

In the second place, Germany could not negotiate a peace singly; her Allies, Austria-Hungary, Bulgaria and Turkey must also be consulted.

In the third place, most important of all, Germany must have a peace which will protect her against acts of aggression such as she has had to suffer recently. Such a peace must provide that, in the East, Germany's enemy will be definitely pushed back to the latter's natural frontier line. Russia has a mission in the East and she must again awaken her interest therein. Neither her genius, nor her methods, nor her civilization entitle Russia to a place in Western Europe; she is but a disturbing influence there. In the West, peace must provide a guarantee that Great Britain does not remain sole mistress of the seas and that Belgium does not remain her satrapy. This War is so terrible, it places the civilization and even the history of the world so near perdition that it is only by completely upsetting the present order of things that one can hope to obtain permanent benefits. The audience were finally exhorted not to lose sight of the fact that their highest War aim should be: "A Germany powerful in all free and noble undertakings, and

living by her side and with her peacefully-minded peoples! *Regnum Dei in terris!* The Kingdom of God on earth!"

It is said that von Harnack's Germanic homily did not meet with much success. Other speakers do not appear to have been any more fortunate. The meetings announced to take place at Königsberg and Stettin had to be abandoned; Naumann, the apostle of the "Mittel-europa" creed, and Rohrbach discoursed at Leipzig and Dortmund respectively and proclaimed the views which have given them notoriety; at Stuttgart, Professor Franz von Liszt, of Berlin University, held forth on the internal reforms which the Government should set its hand to; at Munich, Professor Marks carefully avoided the raising of a direct issue, but urged his audience to have confidence in the Government; at Dresden, Kahl was for a War *à outrance*, particularly so far as Great Britain might be concerned; at Bonn, Professor Hashagen was so carried away by the violence of his feelings as temporarily to lose his mental balance.

The total result was that the Conservatives scored a success. The *Deutsche Tageszeitung*, the mouthpiece of the Agricultural League and of Count Reventlow, rejoiced in informing its readers that the reception with which the Peace Party had met in the West proved that the German people were not in favour of a sentimental policy. The Committee of this Peace Party stopped for a time its propaganda work. However, its work had not been entirely without result. Many former members of the League of the New Fatherland associated themselves with certain prominent Liberals for the purpose of forming a new group. Among those who took part in this new movement were Walther Schücking, a jurist of Marburg, Friedrich Wilhelm Foerster, the pedagogue of Munich, the pacifists Quidde and Umfrid, the socialist Edward Bernstein, the suffragettes Minna Cauer and Helen Stöker, Capt. Kurt von Tepper-Laski. A new Committee was formed and it issued a memorandum pointing out that it had come into existence for the purpose of securing a lasting peace. This Committee labelled itself the "Central Committee for promoting International Law"; its War aims were, in many respects, similar to those of the other groups set out in earlier parts of the volume under review, but, in addition, this Committee advocated "that the peace terms should provide for the constitution of effective institutions for the purpose of procuring a peaceful solution of future international conflicts by friendly discussion and juridical decisions, in order that the old policy of armaments, which constitutes a danger to peace, may be entirely done away with." Such a peace the Committee think would alone be a *German peace in the best sense of the word*.

The seventh part of the fourth chapter is entitled *Le Comité Indépendant pour une Paix Allemande*, and deals with the activities of the Committee founded by Professor Schaefer, the annexationist. This Committee received very considerable support in Germany, its membership growing very rapidly. As the authorities had forbidden a public discussion of War aims, Schaefer decided to circumvent them.

On the 15th March, 1916, in collaboration with Paul Fuhrmann, the agent general of the German National Liberal Party, he distributed

broadcast a long petition, whereof 700,000 copies were printed, in which he stated that, in order to obtain a "German Peace," Germany should not hesitate to prosecute a submarine War *à outrance* against Great Britain. The Government had the copies of this petition seized, and when interpellated in the Reichstag, excused the action taken by stating that the document was an inflammatory production and did not possess the attributes of a petition. The incident caused a great commotion in Germany.

When the "National Committee" promoted to secure an "honourable peace" (Chapter IV., Part VI.) organized its great demonstration in July and August, 1916, the "Independent Committee" made up its mind to have a counter-demonstration which should be striking in effect. The latter body were by no means for the Government; at its meetings violent attacks were made on the Imperial Chancellor, and it backed von Tirpitz against him. The Independent Committee sought rather to bring pressure to bear on the Government than to break absolutely with it; its membership consisted of Government officials, National Liberals and Conservatives. It had also the support of the Centre and of the military party. When one military authority put obstacles in the way of the meetings arranged for by the "National Committee," another military authority expressly sanctioned the publication of the big manifesto of the Independent Committee which appeared in the *Deutsche Tageszeitung* for the 24th August, 1916. More than 300 signatures were appended to the manifesto in question, which may be regarded as the opinion of the *élite* of the German nation. Among the signatures appear those of Schaefer, von Liszt, Schiemann, Haeckel, Wundt, von Gruber, Hillebrandt, Count L. von Kalckreuth, Count zu Reventlow, Horst Kohl, the Princes Rudolph von Lippe and Charles von Loewenstein-Freudenberg, Baron von Maltzahn, and many retired admirals and generals. The manifesto of the "Independent Committee" made its appearance then as a continuation of the memorials of the annexationists of 1915; it had its origin in the same surroundings, it bore the impress of the same minds!

But the manifesto does not breathe the haughty *intransigent* spirit of the previous composition of the same signatories; its tone is different. Its pretensions concerning territorial conquests are not so barefaced. The "Independent Committee" would appear to have attempted to tone down the claims in the memorials of 1915 and to have outlined a mean course between these claims and the statements of the Government.

The manifesto opens with a reference to the victories of the German Army resulting in the conquest of three kingdoms. It continues: In spite of this, however, Germany's enemies are not willing to make peace, they wish to crush her utterly; their responsible statesmen repeat, without blushing, the same abominable lies, they utter the same vile calumnies to which they have given voice since the first days of the War. Germany's enemies are trampling on all the rights of the peoples of the world. In a most brutal manner, they are compelling neutrals to dance to their tune. They are working, day in and day out, to oust Germany from all fields of international commerce. They are seeking to starve out members of a whole nation, in order to compel them to lay

down their arms, an end they have not been able to attain by their sword. But Germany's enemies have been baffled in this game. The spirit of sacrifice of the German people and their instinct for organization have caused the weapons used to crumple up in their enemy's hands. Prepared for every sacrifice, armed to put up a strong resistance and firm in their determination to conquer, Germany will let her enemies repeat their savage attacks; but these attacks will all be beaten off. Germany has at last learnt that her real and most dangerous enemy is Great Britain; it is she that is holding the Fatherland's adversaries together and that is the moving spirit among them. Great Britain hopes to plant the banner of Anglo-Saxon domination over the world on the ruins of the German Empire.

Whilst Russia is sacrificing huge armies, whilst France, with its small population, is being bled white, Great Britain continues to put new hope into the exhausted nations. Remember that England is the enemy.

The ever-increasing population of Russia will one day be a serious menace to the Fatherland; that is the reason why Germany desires to remove from Russian domination the regions situated between the Baltic Sea and the Volhynian Marshes. Placed under the influence of Germany these regions would afford the necessary military protection on her Eastern frontier.

The spirit of revenge of the French people must also be reckoned with. To meet this Germany must increase her power in the West at the expense of France.

Germany's national strength will provide the guarantees which the German people require as far as their principal enemy, Great Britain, is concerned; Albion's jealousy will not be able to prevent Germany's peaceful development. Belgium can only be a German bastion and not a British one; on this matter Germany will demand solid guarantees. "Militarily, economically, politically, Belgium must come under the control of Germany."

It is thus that Germany will obtain what is due to her in the world. It is thus that she will secure the Liberty of the Seas. It is thus that she will secure a Colonial Empire.

The design of Great Britain is manifestly to isolate Germany politically and economically; Great Britain threatens the latter's life as a nation and a State, her culture, her economic power. It is for this reason that Germany is putting forth her strength to compel her enemies to sue for peace. She is fighting so as to have an open field for her commerce, so as to secure the development of her industries, in order thus to ameliorate the lot of the German workman. The British are saying that Germany may win battles, but Great Britain will win the War; but these are but the words of idle dreamers. People of Germany, be strong! It is for your existence and your future that you are fighting. Hindenburg has indicated to you your duty: "It is not a question of holding out to the bitter end, but of conquering."

The eighth part of the fourth chapter is entitled *Oustranciers et avisés* and deals with the later developments in the two currents of opinion which have always existed in Germany on the subject of territorial

acquisitions. In 1916, the annexationists and expansionists of 1915 became respectively the *outranciers* (or whole hoggers) and the *avisés* (or wiseacres).

The *outranciers* consist of those who see in Great Britain Germany's principal enemy. They dream of a separate peace with Russia, whose rivalries will later be so valuable in keeping Great Britain in her place; such a peace cannot naturally be obtained without some *quid pro quo*. They wish for annexations and territorial aggrandisement in the East as well as in the West, for the dismemberment of Belgium, for the creation of a Germano-Flemish State. They possess the instinct for conquest. They discount a complete victory and the complete exploitation of victory; but not a premature peace. In their opinion, Germany is capable of holding her own single handed during the War and she must be able to do so also when peace reigns. She will be the stronger the more exclusive she becomes. A state of War is but protection in its most extreme form. All is fair in love and in War. To crush Great Britain, submarine warfare must be pushed to extremes. Doubtless this will cause others to suffer and to protest; maybe even to enter the lists against Germany. But Germany does not fear even a world full of enemies. She is strong. What is essential is that the *patriotische Einheit*, the holy unanimity of the first days of the War, the "ideas of 1914" shall continue to prevail. Therefore internal reforms must be postponed.

Such were the arguments of the Conservatives, of the majority of the National Liberals and Progressists, of the Catholic Centre, of the Prussian squires, of the Agrarians, of the protectionists, of the landowners and peasants, of the majority of the professors and intellectuals, of the middle classes, of the civil servants, of Government contractors, of the proletariat and lastly of the military party, a veritable dictatorship so far as the civil population was concerned.

The *avisés* consist of those who feel that Germany will never be able to get the better of Great Britain; moreover it would be useless if she did so. Consequently, it will be more to Germany's advantage to seek the price of her victory at the expense of Russia. The *avisés* would be content with guarantees in the West, but they demand territorial acquisitions in the East, either directly by annexation or indirectly by the creation of Vassal States. They repudiate the idea of conquest. They speak of nationalities. They are concerned with the reactions likely to be produced by German policy and with Germany's future in consequence. They do not look forward with equanimity to the prospect of the break with neutrals which is likely to be produced by submarine warfare *à outrance*. They only demand the Liberty of the Seas and open ports. Their conception of German hegemony is more subtle and more insinuating than that of the *outranciers*. Germany ought to have the most extensive access to every part of the two hemispheres. They recognize that the longer the War lasts, the more difficult will it be for Germany to re-establish economic relations with her former customers. The earlier the peace, the more profitable will it be to Germany. They feel that internal reforms leading to a democratization of the Empire are necessary.

Such is the angle of view of certain classes of Conservative Imperialists, of National Liberals and Progressists, of the Socialists, of the financiers, of captains of commerce, of ship owners, of some intellectuals and professors, and of a part of the middle and of the labouring classes.

The cleavage between *avisés* and *outranciers* is less a matter of party politics and social standing than that of temperament and personal inclinations. In the ranks both of *avisés* and of *outranciers* alike are to be found not only Germans, but also Pan-Germans. However, in spite of the fact that the War aims of the *avisés* appear extremely moderate in comparison with those of the *outranciers*, it is the War aims of the former that constitute the more serious menace to the Liberty of the World.

Chapter V. is entitled *Les Invités à la Paix* (1916—1917) and is subdivided into three parts. The first part is entitled *La Suggestion aux Alliés* and deals with the German peace proposal of 12th December, 1916. When the question of peace was broached, a free discussion of War aims at last became possible in Germany, so far as the censorship would admit. However, the German Government refused, more obstinately than ever, to disclose its programme. When addressing the Reichstag on the 17th February, 1917, the Imperial Chancellor stated that although much had been said and written on the subject of War aims, nevertheless he felt it would be useless, in the position which he occupied, for him to formulate promises or to lay down the exact conditions of peace. He contented himself by reiterating the statement that the peace he looked forward to was one that would be lasting and which would indemnify Germany in respect of all she had suffered, at the same time securing for her a strong position and a brilliant future.

It would seem, however, that Germany had caused her peace proposals to be conveyed secretly to the Entente Powers. Monsieur Vandervelde, the Belgian Minister, speaking about this time at the Trocadero (Paris), enumerated the peace conditions which it was understood would be imposed on Belgium. The terms indicated were confirmed in articles published in the Swiss, French and American Press. When these revelations had been made, articles, although couched in more vague terms, also appeared in the German Press laying down almost identical conditions. It may be assumed then that when Germany put out its feelers, the Kaiser's Government had a cut-and-dried programme. It was announced by the German Press that if peace pourparlers were to begin to-day the German Empire would offer to restore to France territories in the former's occupation subject to the following conditions:— (a) Cession to Germany of Briey and its mineral basin; (b) cession to Germany of a port on the English Channel, Calais or Dunkirk; (c) payment to Germany of a War indemnity of 600 millions sterling. As regards Belgium, the German Empire would express its readiness to provide "for the restoration of her territorial integrity and sovereignty" under the following reservations:—(a) Belgium will be forbidden to keep up a national Army; (b) Germany will have the right, in perpetuity, to provide and maintain garrisons of her own troops in the *fortresses* of Namur, Liège, and Antwerp; (c) a German Commission will exercise

control over Belgian railways and ports; (d) a Commercial Treaty, favourable to Germany, will be negotiated between the two countries.

The Pan-German agitation now recommenced with redoubled fervour. The Government next made a capital concession to the *outranciers*; on the 2nd February, 1917, it announced its decision to undertake a submarine War à *outrance*, and risked a rupture with the United States of America and with other neutrals. The "Independent Committee" (*vide* Chap. IV., Part VII.), now on the side of the Government, organized a vast bellicose propaganda and conducted it with Chauvinistic enthusiasm. It held a great meeting in Berlin on the 19th January, 1917, when it sent a telegram to the Kaiser giving expression to sentiments of loyalty. Meetings were also held in the Provinces, when the speakers, mostly belonging to the National Liberal, Conservative and Progressist Parties, announced the War aims of their organization to be: Annexations in the East, in Courland specially, or at least a German domination over the Baltic Provinces; a political, military and economic domination by Germany over Poland, including Lithuania, and also over Belgium; the acquisition of Calais, Dunkirk, and Boulogne for the purpose of menacing Great Britain; the consolidation of the German frontier at Metz; annexation of the mineral regions of Longwy and Briey; the strategic rectification of the French frontier along the Vosges as far as the Meuse, by the annexation of Verdun, Toul, Nancy, Luneville, the Vosges and Belfort; the restoration of the German Colonies with additions thereto; free ports, the Liberty of the Seas with *points d'appui* and supply bases for the German Navy on the Great Sea routes; War indemnities, payable not only in specie, but in food and in prime necessities.

We are asked to compare the most recent programme of the notorious Pan-German League with the foregoing; the similarity between the two is striking. The Pan-German programme in question is set out below:—

(i.). Germany must annex a part of the French territory occupied by her.

(ii.). Belgium must be linked to Germany.

(iii.). Germany must have a Naval base on the English Channel, W. of the Straits of Dover.

(iv.). Germany must take over the Baltic Provinces, Lithuania, Poland and a great part of the Ukraine.

(v.). Germany must annex Belgian Congo, in order that with her former Colonies she may create a great German Colonial Empire in Central Africa.

(vi.). Germany must establish Naval bases throughout the world.

(vii.). Austria and Bulgaria will divide between them Roumania, Serbia, Montenegro, and Albania.

(viii.). Turkey will annex Egypt, the Soudan, Tripoli and its hinterland as far as the confines of the German Colonial Empire in Central Africa.

The "National Committee" now left the field open to the "Independent Committee"; the former seems to have been outmanœuvred, nevertheless it could not deny itself the privilege of putting the public in possession of its latest programme, the terms of which were as follows:—

1. The peace shall be not only a "German peace" but also that of the German Allies, and a peace which will continue the existing alliances of Germany.

2. The decision as to what shall be done in the case of the occupied territories must be determined by military requirements and by considerations affecting German interests. Most important of all is the question of the rectification of frontiers; the phrase "policy of annexion" must not frighten the German people.

3. The Liberty of the Seas must be secured for the German people and all those who are not British, and in particular for neutrals.

4. A powerful Colonial Empire capable of self-defence must be ceded to Germany.

5. A War indemnity corresponding to the extent of Germany's sacrifices is indispensable.

Although the "National Committee" tried to keep up the pretence that its point of view was not the same as that of the "Independent Committee," it is easy to see that, after the German peace offer of 12th December, 1916, was made, the programmes of the various Committees, Leagues and Groups in Germany that were concerning themselves with peace terms were brought more or less into line with one another. The *outranciers* swept the *avisés* off the field. But silence was imposed on all dissidents; the liberally-minded and the Socialist minorities alike.

The second part of the fifth chapter is entitled *Invites à la Russie* and deals with the *volte face* suddenly made by the German Government when it learnt of the revolution in Russia. The Imperial Chancellor, having been questioned in the Reichstag, on the 15th May, 1917, by Roesicke, the Conservative, who spoke in the name of the annexationists, and the *outranciers*, and by Scheidemann, the leader of the Socialist majority, who, in order probably to coax the Russian, alluded to the possibilities of a revolution in Germany, replied to his interrogators in the following sense:—I have been asked to state the War aims of the German Government. It would not be in the interests of the country to supply this information at the present time and I therefore must refuse to do so. Since the winter of 1914-15 I have been frequently pressed to state our War aims in detail and my silence regarding the programmes of the various parties has been construed into an approval thereof. I again enter a categorical protest against such an assumption. When the time arrives for settling Germany's War aims, I wish it to be clearly understood that the Government will not be in a position to take part in any public discussion on the subject and it will not participate therein.

I have said here, from my place in the Reichstag, all that I can say on the subject of Germany's War aims; these were given expression to in solemn form on the 12th December, 1916, when, jointly with her Allies, Germany made an offer of peace.

I quite understand that the nation should be occupying itself so earnestly with War aims and peace conditions. There can be but one line of conduct for me: *to seek a rapid and, at the same time, a successful conclusion of the War.* I can neither do nor say more than this. Neither

Herr Scheidemann nor Herr Roesicke will turn me from this path. Neither Great Britain nor France show any inclination for peace; indeed, on the contrary, they are doing all they can to excite people weary of the War to continue it indefinitely.

As for Russia, it seems to me that New Russia has renounced all big schemes of conquest. Undoubtedly, Great Britain, aided by her Allies, will do her level best to keep Russia harnessed to her chariot of War and to thwart the wishes of the Russian people for the re-establishment of an early peace in the world. But should Russia desire to save her sons from the toils of death, to renounce all her violent schemes of destruction, to establish lasting, pacific and neighbourly relations with us, naturally we will, on our side readily fall in with her wishes, and we will not render the consummation of the end in view impossible by putting forward demands incompatible with the liberty and instincts of the Russian people, demands likely to give birth in the souls of the Russian people to seeds of a new enmity. I am of opinion that it is possible to arrive at an understanding founded exclusively on reciprocal treatment from which all ideas of violence shall be excluded.

If the foregoing statement is compared with that made by the Imperial Chancellor on the 5th April, 1916, the flagrant contradiction between the two becomes at once apparent; it is a case of a velvet glove to-day, whereas last year it was a case of claws and fangs. The Socialists, on the other hand, have been more logical; they are "realists" and only consider the interests of Germany, "idealists" though they may be in theory. Questions relating to the Baltic Provinces, Lithuania, the Ukraine, in fact all German aims in Russia have been perfidiously removed out of the way as if by a sleight of hand. By reason of the clumsiness of the camouflage, the fact reveals itself that the Socialist declaration is directed against the Powers in the West.

The Peace of the social democracy is but a "German peace," a "German peace" clothed in hypocrisy; it pretends to be seeking a solution by mutual consent, and it claims to couple with its demand for guarantees in relation to the free political, economic and cultural development of the German people a condemnation of acts tending to violate the vital interests of other nations. It accepts the principles of peace advocated by the Council of Soldiers and Workmen formed in Russia, that is to say a "peace without annexations and indemnities" and one based on the right of each country to work out its own salvation; it has passed resolutions under seven heads laying down its views on the several points connected with German War aims which have from time to time been under discussion.

The third part of the fifth chapter is entitled *Les Trois Formes de Paix Allemande* and contains a brief review of German War aims generally. It is pointed out that if the views of the Socialist minority and those of certain intellectuals and Liberals, who are a rare exception to their class, be excluded, the "German peace" proposals fall, towards the end of the third year of the Great Cataclysm, into three distinct classes or groups:—

1. The expansionism of the Socialists or the white peace. This solution involves a return to the *statu quo* and would leave Germany the

victor, permitting her to regulate for her own benefit the organization of the future *Society of Nations*.

2. The expansionism of the *avisés*. This solution provides for obtaining the hegemony of Germany throughout the world by a system of *guarantees*, disguised annexations, strategic rectifications of frontiers, by the Germanic conception of the *Liberty of the Seas* and *open ports* and by the acquisition of a vast Colonial Empire.

3. The annexationism of the *outranciers*, which aims at obtaining results similar to those advocated by the *avisés*, but in a way that would be more striking and more brutal. This solution demands the re-drawing of the political map, the final ruin of the vanquished and the continuance of the militarist policy of domination by the sword.

The special features of the three proposals in relation to time are that the Socialist peace *must* be *immediate*, that of the *avisés* can be *quickly* obtained, that of the *outranciers* one that is *postponed*. The first displays conventional ideas, conceived almost exclusively for the benefit of Germany; the organization of the *Society of Nations* on a juridical basis; the second accepts these ideas, but as being of secondary importance; the third will have none of them. In all three cases the ends in view are held to be realizable by means of a *separate peace* with each belligerent (commencing with Russia), whereby the knot that binds Germany's adversaries together is to be untied. At the same time, it seems to be contemplated that Germany's present Allies may continue in a state of vassalage, even if they be not incorporated into the Mitteleuropa State, the future Greater Germany.

But the development of the Socialist formula has had the effect of pushing the expansionism of the *avisés* towards the annexationism of the *outranciers*, which has itself become, in appearance, less *intransigent*.

The Prussianized German people have become so well disciplined that their programme of domination may be ascribed to their extreme readiness to render obedience in all things. From an outsider's point of view the "German peace" proposals, in all three forms, have a striking Pan-German likeness; but from the point of view of those within the pale, the three forms do not consist of claims that are interchangeable, but of those that mutually exclude one another. However, even if a formula is found which, without satisfying anyone of the three parties in question, may nevertheless be accepted by them all owing to War weariness and final exhaustion, even that peace would always be a "German peace." It would not be the world's peace. If, at the present time, nearly all the civilized peoples are found ranged against Germany, this situation has certainly not been brought about by any skilfulness on the part of the diplomacy of the "Entente"; Germany owes it to herself alone. Peace cannot be nationalized in the same fashion as a "German God," nor can it be manufactured as an article—bearing marks of the country of its origin—for export only; no peace imposed by a conquering nation on a vanquished one can be a lasting peace where all the obligations, duties and conditions are framed on a unilateral basis. The same remark applies to the peace which is a compromise between adversaries who are equal in strength, and still more so to a peace which is the product of the bastard insinuations of a

Germanized *Internationale*; an "honourable peace" postulates honour, and there is no reasonable being in this world who can conceive such a thing as honour without justice.

Containing as it does the recorded views on the War aims of the several German groups, the volume under review is one of the most valuable of the recent issues of the "Pages d'Histoire" series; and Monsieur Pariset is to be congratulated on the able manner in which he has brought the available material contained therein together. That there should be some repetition in the volume is something that could hardly be avoided when one remembers to what an extent education has been standardized in Prussianized Germany; indeed, it would, under the circumstances, have been a matter of wonderment had the patriotic litanies of the Teuton presented wide dissimilarities.

W. A. J. O'MEARA.

NOTICE OF MAGAZINE.

REVUE MILITAIRE SUISSE.

No. 8.—August, 1917.

IMPRESSIONS FROM THE AUSTRO-HUNGARIAN FRONT.

VII. *With the Army of Transylvania.*

The Invasion of Roumania. The Wooded Carpathians.—The first article on the above subject appeared in the number of the *Revue* for August, 1916 (*vide R.E. Journal* for November, 1916). The text of the original article under notice is accompanied by reproductions of photographic views of the country in which the Austro-Hungarian Army is fighting.

In January, 1917, the Army of Transylvania, consisting of the Austro-Hungarian I. and II. Armies, was extended on a front of nearly 190 miles, from Otos, in Roumania, to the Tartares Pass, on the Bukovina frontier. This Army was commanded by the Archduke Joseph.

In August, 1916, when the Roumanian Army penetrated into Transylvania, it was opposed alone by the 39th and 61st Hungarian Divisions and a few Landsturm battalions. These troops retired, putting up a stubborn fight the meanwhile, on to the line Segesvar-Valley of the Maros-Szasregen in order to give time for reinforcements to be brought up; needless to say they destroyed the bridges and railways in the region vacated by them. The Roumanians advanced with great caution. At the end of September, the Austro-Germans were in a position to assume the offensive. After the Battle of Hermannstadt, the Roumanians were forced to repress the Rotenturm, and Falkenhayn pursued them into Wallachia. At the same time, further north, von Arz's Army, which was covered by a Cavalry Corps, pushed the Roumanians back in quite a short time to the line of the Upper Alt; this river line was reached on the 10th October. The Austrian 1st Cavalry Division pushed on to the Gyimes Col, on the Roumanian frontier; it entrenched itself there and awaited the arrival of the main body. By the middle of October the Roumanians had been driven back along their whole front into Moldavia.

It was at this time that the Russians made a tardy effort to succour their Allies by launching a vigorous offensive in Bukovina and in the Wooded Carpathians. The Roumanian Divisions fighting in the northern part of Moldavia were relieved by the Russians at the beginning of November; six Russian Divisions were made available for transfer to the south. But the Roumanian Army was already so played out as to be incapable of taking the offensive.

At the end of November, Falkenhayn threatened Craiova and, on the 6th December, Bucharest fell into Austro-German hands without offering any resistance. The Roumanian retreat was now accelerated by the continuous pressure from Mackensen in the south and from the Archduke Joseph in the west. The Army of Transylvania advanced skirting the Moldavian frontier, its right wing faced N.E., and attempted to reach the Trotus, a tributary of the Sereth. In January last, it linked up with Von Gerok's Army Group, which was on Falkenhayn's left. Further north, in Bukovina, in the region of Kirlibaba and Dorna Watra, the Russians multiplied their attacks (in the depth of winter) in an extremely inhospitable mountain country, sparsely populated and ill-provided with roads. The tactical successes gained by them possessed no ultimate value and were obtained at a cost altogether disproportionate to the casualties suffered by them. Von Kovess and von Arz, both Hungarians by nationality, commanded the Austro-Hungarian Armies. The former had commanded the Army which was engaged in 1915, in the second campaign in Serbia. The latter was, on the date of the declaration of War, Chief of Section in the Ministry of War; he immediately took over command of the 15th Division and in September, 1914, was promoted to the command of the VI. Austro-Hungarian Army Corps. When the Roumanians invaded Transylvania, von Arz was given command of the recently improvised I. Army, and after the Roumanians were driven back, he became Chief of the Austro-Hungarian General Staff.

The most important points, from N. to S., of the Wooded Carpathians are: the Tartares or Jablonica Pass, which leads from the valley of the Theiss into that of the Pruth, the Capul Bluff, N. of Kirlibaba, the *point d'appui* of the Mesticanesti, near Valeputna, and the heights on the left bank of the Bistriz, which command Dorna Watra.

Three railways alone traverse this mountain chain; that from Maramaros Zsiget to Kolomea, *via* the Tartares Pass; that of the Gyimes-Col, which leads from the Valley of the Csik into that of the Trotus; that from Dorna Watra to Kimpolung, which connects the valley of the Bistriz with that of the Moldava. A branch line, parallel to the frontier, runs between Kronstadt and the valley of the Maros. All the other lines are of minor importance and end in *culs de sac*.

Roads fit for vehicular traffic only exist in the principal valleys. Rough paths often run along the banks of the mountain streams. The forests are practically impassable; a track can only be hewn through them by the woodman's axe.

The Carpathians possess many of the characteristics of the Alps; there are but few large valleys in them and no deep ravines, but there exists a closely netted system of tortuous valleys. The highest points of the Wooded Carpathians do not exceed 7,250 ft.

The rock in these mountains is well able to withstand the battering of heavy artillery. Plenty of natural cover exists for the reserves and the artillery of the defence can play its part without being disturbed and with the minimum of casualties.

War of Positions.

Density with which Fronts were held.—A visitor examining the front held by the Army of Transylvania in December, 1916, and January, 1917, could not fail to be struck with the great extent of front held by the small numbers employed; for example, a company was allotted to a particular section, which, according to pre-war views, ought to have had a whole regiment told off for its defence. In no case was the allotment of troops so high as one man per yard of front. The Austro-Hungarian I. Army Corps held, in January, 1917, a front of $15\frac{1}{2}$ miles with 16,000 rifles; the XI. Army Corps a front of 31 miles with 20,000 rifles; the VI. Army Corps a front of 37 miles with 22,000 rifles. Many companies held a front of 1,000 yards, and in one case 100 rifles were told off to a front of 1,750 yards, and held it against renewed attacks. Four machine guns were allotted to the front held by each company.

Reserves.—Not only was the front line held with small numbers, but there was also a similar lack of density as regards numbers from front to rear. There was no general reserve, but each section of front had its local reserve; this system is practically essential in a mountain region owing to the difficulties of lateral movement.

The reserves held the second line, and sometimes a third line. During the bombardment preceding an assault, the troops holding the front-line trenches sought shelter in their dug-outs and only lined the parapets when the enemy's infantry moved forward to the assault.

As the Russians generally attacked on a very narrow front, the reserves of adjacent sections were moved to positions in rear of the section attacked ready to reinforce the troops holding the same.

Advanced Posts.—As the opposing forces were at certain parts of the front 2,000 yards apart, a regular system of advanced posts grew up in such localities. About 300 yards in advance of the section of front held by each company a certain number of observation posts were constructed for occupation by N.C.O.'s; these were connected to the Company Headquarters by telephone. In very accidented country, four such posts were provided for each company. During the night patrols moved along the front from post to post.

Listening posts were provided both in advance of and in rear of the wire entanglements; the former were occupied in the daytime, the latter at night.

In the trenches there was, during the night, always one man on watch per section.

Russian Method of Attack.

Russian troops when attacking are covered by a dense curtain of patrols whose function is to dislodge the enemy's advanced posts.

The Russian artillery preparation begins as a rule late in the afternoon. Its fire is first concentrated on the obstacles; but in January last, they appeared to be husbanding their ammunition, since they did not always sufficiently destroy the Austrian obstacles. The Russians also attempted to make gaps in the obstacles by means of hand-thrown mines.

Next follows a concentration of the artillery on the first-line trenches.

For this purpose, the Russians employ a method of fire, known to Austrians as *Punktschiessen*, i.e., regular and accurate fire kept up for several days against the same targets. The moral effect of such fire is said to be greater than that of *Trommelfeuer* or Drum-Fire. This bombardment continues throughout the 24 hours.

During this period the attacking infantry come up to within 500 to 600 yards from the positions which it is intended to capture, and dig themselves in.

When the infantry attack is launched the Russian artillery lifts its fire and brings it to bear against the enemy's reserves, the adjacent sectors of defence and the enemy's artillery. Field guns continue their fire against the first-line trenches until the attacking line of infantry reach the obstacles.

From this time onwards the field guns endeavour to break up the counter-attacks attempted by the enemy's reserves, in order to give their own infantry a chance of seizing the enemy's trenches and consolidating themselves therein.

The Russians advance in successive lines of skirmishers, 150 to 300 yards apart. The men of the first wave are provided with wire cutters and hand grenades, but do not carry rifles; few of them survive: succeeding waves often take forward their machine-guns; the success of these waves depends upon the state of the enemy's demoralization or his losses. The sixth to the eighth waves as a rule succeed in penetrating into the enemy's trenches.

If a Russian attack is repulsed, the artillery preparation recommences and a second assault is delivered on the day following.

Infantry attacks are delivered in the daytime; this is because of the difficult nature of the *terrain*. At night, attacks in wave formation are not possible in mountainous country.

The Russian barrage fire during an attack often involves the enemy's reserves being moved, and seriously interferes with the supply services; Austrian supply wagons, it is stated, have been hit when more than 6,000 yards behind the firing line.

The Fortifications in the Mountains.

The Austrian trenches are, in broken country, constructed in short sections and consist of a series of successive salients; sometimes, isolated closed works are constructed within supporting distance of one another. The Austrian infantry now prepare their own defences and do a great deal of work which formerly fell in the province of technical troops. However, it has been found necessary to form a *technische kompagnie* (a company of specialists) in each regiment; this company receives a special training in order to enable it to execute technical work.

An Austrian *position* generally consists of two or three parallel lines of trenches or works from 100 to 300 yards apart. All these lines of works are put in hand simultaneously; the second and third lines being constructed by the reserves.

The system of closed supporting points, abandoned in 1914 and 1915, was reintroduced in 1916. Works of this kind, with garrisons of from one to two companies, have been found very useful in mountain regions.

It was works of this description at the Mesticanesti Tunnel, on the Dorna-Watra-Kimpolung railway, and in the Bukovina that defied the efforts of the Russians for eight months.

The design of the Austrian trenches is very similar to that until recently employed by the Germans in Northern France. In the mountain regions, in addition to the obstacles normally met with, the Austrians have added the so-called *Steinlawinen* or stone avalanche. They have also made much use of *camouflage* in connection with their defensive positions in order to deceive their enemy.

Transport.

The Austro-Hungarians have adopted, as their single standard vehicle, an ordinary peasant's cart as normally used in the country; it has given satisfaction. It is a sort of ladder cart weighing about a couple of hundredweight and drawn by two horses; it can carry a load of 4 cwt. These vehicles were at first obtained on requisition, but are now being manufactured by the State.

Dogs are also being employed for draught purposes now.

In the Carpathians an infantry battalion is provided with 120 pack animals and 12 baggage wagons. An infantry regiment is also provided with 15 vehicles reserved solely for the transport of barbed wire.

Equipment and Stores.

Winter Garments.—Before the War, the soldier's clothing was provided on the basis of summer wear only. But in order to meet the rigours of the climate in the mountain regions in which the Austro-Hungarian Army has been obliged to fight woollen under garments, double-lined capes and greatcoats, fur-lined jackets, woollen caps, warm gloves, etc., have now been issued to the men. At times there is 25 to 30 degrees of frost in the Carpathians.

The troops are all provided with travelling kitchens, and these are taken as close as possible to the front-line trenches, in order to ensure that hot meals may be served to the men holding these positions.

In the mountain regions many Telfer lines have been erected; ammunition and supplies are carried by this means to the positions at the greatest altitudes occupied by the Austro-Hungarian troops. These Telfer lines are of the simplest nature, and the actual haulage is provided for by a single horse in the case of each line.

Observations on the Russian Forces.

At the beginning of January, 1917, Brussiloff's Army consisted of the 8th and 9th Russian Armies (Kaledin's and Letchinski's).

The deficiency of officers which existed in the Russian Army in the autumn of 1915 was still more marked at the beginning of the current year. Officers were rarely found among the enemy's dead or amongst the prisoners taken by the Austro-Hungarians. The attacking troops were led by N.C.O.'s and one or two officers per regiment. The officer problem is a most difficult one in Russia as there is no leisured middle class in that country on which to draw. Casualties among Russian officers was extremely heavy at the beginning of the War, and it became necessary to commission N.C.O.'s in large numbers; they were often illiterate.

Use of Cavalry in Trench Warfare.

The Jacobeny-Dorna Watra Sector was held by several divisions of cavalry which fought in the trenches, after having fulfilled their rôle in October, 1916, of independent cavalry. The regiments of these divisions, reinforced by machine-guns (12 per regiment) and Horse Artillery were reorganized so as to enable them to put as many rifles as possible into the trenches, whilst maintaining their characteristics as mounted troops and also their mobility. When the war of movement came to an end, three out of the six squadrons in each regiment (named the *Reiterabteilung*) kept their horses with them at the front, whilst the remaining three squadrons (named the *Schützenabteilung*) sent their horses into the interior of the country. The latter horses were employed on agricultural work.

The men of the *Reiterabteilung* retained their normal equipment, and were employed as cavalry from time to time. This change broke the monotony of life in the trenches. A cavalry division thus organized, was able to put 4,000 rifles into the trenches.

The men of the *Schützenabteilung* were equipped as infantry, but continued to wear the cavalry uniform.

The divisional cavalry continued to be equipped as cavalry.

It is said that the Austro-Hungarian Cavalry has come out of the ordeal through which it has passed in this War with an enhanced prestige.

To-day, very considerable attention is being paid in Austria-Hungary to the musketry training of cavalry; equitation, however, being by no means neglected. Indeed, everything which tends to develop boldness, dash and the essentials of the cavalry spirit is being fostered with sedulous care.

TRENCH ARTILLERY.

Trench artillery has acquired considerable importance, relatively, in the present War. And every day one sees the increased importance that the belligerents, on both sides, attach to the personnel detailed to man this new arm and to the auxiliary equipment for these weapons. This is particularly so in the case of the Belgian Army.

It was at the beginning of 1915 that trench artillery first made its appearance as an independent unit, with its own characteristics and its special tactics. Its evolution, at the beginning, did not proceed methodically, but as experience was gained and the requirements came to be properly understood, the development of this arm settled down into a definite channel. The French were the first to make use of trench artillery in the present War; they began by employing a few weapons of this class and a personnel of 180 men in the Artois region. The results achieved were so promising as to lead to a rapid growth in this arm. The introduction of short-range artillery was the natural sequel as soon as the infantry of the two sides took to that form of warfare which brought them within a few hundred feet of one another, each protected by earth parapets, and provided with all the accessories that the engineer's art could place at their disposal. The enemy's parapets and obstacles had to be destroyed somehow in order to give infantry attacking such defences a chance of success. Ordinary artillery placed 6,000, 8,000 or

may be 10,000 yards from the enemy's trenches was not in a position to direct its fire with such accuracy as to avoid hitting the defence works of its own side under the conditions in question. A catastrophe of this kind had to be provided against owing to the disastrous effects likely to be produced, should the artillery cause considerable casualties to the infantry of their own side just at the time that an assault was about to be delivered by the latter. To the desire to avoid such catastrophes is it that trench artillery owes its birth.

Trench artillery, it is pointed out, possesses considerable advantages of an economic order; considerable energy is expended in propelling a projectile towards a target at long range, and a great part of this energy is uselessly spent so far as the destructive effort of the projectile is concerned. If the theoretical aspect of the economic problem be represented by the equation

$$P = M \times D,$$

where

P = Explosive force of the charge,

M = Mass of the projectile,

D = Distance travelled by the projectile,

then the smaller D is made in the same proportion can P be reduced without any diminution in the destructive power of a projectile which depends on its bursting charge for the work done by it against its target, e.g., if the range be reduced from 8,000 to 800 yards, the charge in the cartridge can also be reduced in the proportion of 10 to 1; this represents a saving of 90 per cent. However this saving does not represent the whole of the economy that may be effected. A reduction in the charge naturally brings about a reduction in the pressure exerted on the tube of a gun by the gases liberated on the ignition of the propellant; the pressure exerted by gases liberated by different quantities of a propellant fired in a given confined space are directly proportional to the charges exploded therein. Hence it is that with short range trench warfare weapons very considerable economies are effected in the weight of metal required in their construction; in addition many other advantages are gained, particularly in connection with the manufacturing processes as compared with those employed in the construction of ordinary field and heavy artillery.

Another advantage that trench artillery possesses in comparison with ordinary artillery is that the detachments required for manning them are smaller and no elaborate arrangement of telephonic communications, forward observation posts, etc., need be provided.

An explanation is given in the original article of the successive steps by which the present designs of trench artillery were arrived at. The first solution of the problem was attempted by reducing the initial pressure in the bore; the second, by increasing the size of the projectiles, but without making any alteration in the initial pressure.

The theoretical equation given above can be stated in either of the two following forms:—

$$M = P \div D, \text{ or } D = P \div M.$$

Consequently if P remains constant any increase in M will involve a proportionate decrease in D , e.g., if with a certain charge a 9-lb. shell

can be propelled 10,000 yards by a gun, with the same charge a 90-lb. shell can be thrown 1,000 yards by the same weapon.

In following up the second of the lines of attack referred to above many difficulties of a technical nature were met with, but were successively overcome. It is undesirable at the present juncture to give detailed particulars of the latest types of trench armament. All that can be said is that very considerable progress has been made and some very powerful types of short-range artillery has been designed and put into the hands of the troops.

NOTES AND NEWS.

Switzerland.—Colonel Wildbolz has published a striking article on the training of the soldier in the number of the *Allg. Schw. Militärzeitung* for 30th June last; this article has caused quite a stir in Swiss military circles. Put shortly, he is of opinion that the Swiss soldier is made to do so much purposeless drill as to make him positively fed up with military service, whilst at the same time this part of his training is carried out in a manner which loses sight of the true functions of a soldier and results in a rigid formalism which is altogether incapable of turning men into efficient combatants.

In commenting on the article in question the author of the original notes in the *Revue* calls attention to a maxim which is now many centuries old: *La lettre tue et l'esprit vivifie*. The duty of officers entrusted with the training of soldiers, he tells us, is not to look upon them as merely *matériel hommes*, i.e., automata, who are to be dealt with in accordance with fixed rules which have acquired the force of *custom*, but rather is it their duty to realize that they are dealing with *êtres humains*, i.e., reasoning creatures, each of whom possesses a certain individuality and idiosyncrasies of his own, qualities which must be taken into account if their military education is to be properly carried on so as to turn them out as efficient fighting men. It is a soul that the officer, who desires to escape from the servitude of the strict letter of the instructions that kills, requires.

Dealing with another subject, regret is expressed that as much has not been made of the opportunities which have offered during the past three years, in connection with the development of the Swiss Army, as would have been the case under *another inspiration*. However, it is hoped that profit will be derived even from the unfortunate experiences through which the Swiss Army has passed. It is stated that not only the Swiss Army but the whole Swiss Nation have been contaminated by the unfortunate spirit of imitation of things foreign and by a unilateral study of history and of the philosophies.

It is urged that as a first step a reform should be made in the system of instruction of the Swiss Nation. Regret is expressed that many publications of high educational value are not sufficiently widely read in Switzerland. It is stated that a French translation of Kuno Hofer's recent work, *Die Keime des Grossen Krieges* (The Origin of the Great War) would be welcome and that Zurlinden's *Der Weltkrieg* (The World War), should have a wider circle of readers among the romande Swiss. Attention is also called to Oeschli's *Tableaux de l'histoire universelle*. The

people of the Swiss Confederation are recommended to turn their attention to the acquiring of a better knowledge of themselves, and to commence first by the instruction of their *élite*. Had Swiss officers, it is said, known what was due to Switzerland many unfortunate incidents might have been avoided and a salutary influence might have been exercised by the Corps of Officers during the past three years on the whole of the Swiss people under arms. Under such circumstances Colonel Wildbolz might not have written the article referred to earlier in these notes, and the humiliating search in the offices of the *Freie Zeitung* might not have been necessary. Germanic influences, probably encouraged by Germans in Switzerland occupying more or less official positions or by those possessing a more or less officious temperament, have led a certain number of Swiss officials into dubious paths of conduct. Complaint is made that in the present day there are to be found persons in Switzerland in high offices who have a leaning towards Imperialism, an attitude which is in direct conflict with all the healthy traditions of the old Swiss republicanism.

The Bill dealing with the revision of the law relating to the military forces of Switzerland is still under discussion. Colonel Secretan has contributed an article to the *Gazette de Lausanne* pointing out the defects in the Bill. It appears that only two situations are clearly provided for, that of peace and that of war. A situation bordering on war and that dealing with a prolongation of war conditions after active operations have ceased are ignored. It is suggested that a clause should be added to the Bill to provide for the contingencies in question.

INFORMATION.

A military society founded twenty-five years ago by the Clerical Establishment of the Swiss General Staff celebrated its first jubilee on the 28th and 29th July last at Neuchatel. On the second date mentioned, the question of the further continuance of the society came up for discussion. Some of the members, it would appear, have shown considerable irritation at the want of success attending the efforts of the committee of the society in their negotiations with the Federal Authorities in matters affecting the interests of the classes forming the membership of the society. Finally, it was decided not to dissolve the society. The chief grievance seems to be that the clerical staff cannot rise to a rank higher than that of lieutenant.

This number of the *Revue* concludes with bibliographical notices of new books dealing with the War.

W. A. J. O'MEARA.