Register, March. 4 1911.

"BREAD-AND-BUTTER" EDUCATION.

School of Mines and University.

Sir Langdon Bonython's Views.

The University Commission met at Parliament House on Tuesday morning, and examined the President of the School of Mines (Sir Langdon Bonython). There were present:—The Chairman (Mr. Ryan), the Hons. A. H. Peake and A. W. Styles, M.L.C., and Messrs. Young and Green, M.P.'s. Sir Langdon gave a clear and lucid explanation regarding the functions of the institution, and made an important contribution to the literature of the commission. Witness said he had been connected with the council from the origin of the School of Mines, but the first President was Sir John Cockburn, Chairman of the Commission appointed to enquire into the subject of technical education, whose report resulted in the establishment of the school. He was also a member of the commission. The first council was appointed on November 30, 1888, and the school was opened in March of the following year. On July 15, Sir John Cockburn resigned, having become Premier, and he was elected President.

The Chairman—Under what authority is the school carried on?—An Act of Parliamnt, assented to on February 17, 1892. The School of Mines was established to take up a sphere of work in which, at the time, nothing was being done.

Not by the University?—Certainly not. Until 1898 the University had devoted itself to arts, laws, pure science, medicine, and music. From its origin the School of Mines conducted associate courses in mining, metallurgy, and mechanical engineering, in addition to the ordinary work of the school. In 1898 regulations were framed by the council of the University under which a diploma could be obtained in mining, engineering, and metallurgy. This was a post graduate course, the regulations providing that students who had passed in specified subjects of the first, second, and third years for the B.Sc. degree might proceed to the course for a diploma in mining, engineering, and metallurgy. The fact that this was a post-graduate course was advanced as justification for what certainly had the appearance of intrusion into the domain of the School of Mines. From the beginning the school had availed itself of the teaching facilities afforded by the University. There was every wish that, so far as possible, there should be no overlapping. This principle was also applied in the case of the School of Design, certain of whose classes were utilized and not duplicated, although they form part of the machinery of every large technical school elsewhere. In a desire to economise public money, and in an insufficient grant, you have the explanation of the policy followed. Committees appointed by the council of the University and the council of the School of Mines met at intervals with the object of preventing duplication. Each agreed to recognise the standard of teaching of the other in particular subjects, and soon there were students who took part of their courses at the University and part at the School of Mines. In 1903 a further agreement was arrived at which provided that to avoid duplication of work and expenditure, the institutions should unite in arranging courses of instruction and examination in subjects which qualified for the Fellowship of the School of Mines and the diploma in Applied Science of the University. Witness read the agreement. Continuing, he said—The school continued to carry on its associate courses, which occupied less time than those for the fellowship, and, consequently, the associateship was more easily obtained. The University undertook not to teach assaying, metallurgy, surveying, or building construction; while the school surrendered physics, geology, and chemistry in regard to both fellowship and associate courses. The lecturer in mining became lecturer at both institutions, the first year lectures being given at the school, and the second year at the University.

What was done under the agreement?—Fellowship and diploma courses were conducted in mining, metallurgy, mechanical engineering and electrical engineering. Designed as four year courses they are of such a standard that the University admits to the degree of B.Sc. any Fellowship graduate of the school, who may have matriculated or passed the prescribed examination in two languages. This he may do at any time either previous to, or after completing the fellowship course. A standing board was appointed consisting of an equal number of representatives of the two institutions to consider all questions arising out of the agreement and to make recommendations thereon to the councils also. A Faculty of Applied Science was also appointed, consisting of the Chancellor of the University and the President of the School of Mines and four of the staff of each institution. It reports to the Joint Board. At present it is thus constituted:—University—The Chancellor, Professor of Chemistry, Professor of Physics, Professor of Mathematics and Lecturer on Electrical Engineering. School of Mines—The President, the Registrar, Lecturer on Metallurgy, Lecturer on Mechanical Engineering, and Lecturer on Mathematics. Each institution issues its own diploma. Under the agreement, and under the arrangement which prevailed before it came into existence, the University has issued 38 diplomas in applied science, and the School of Mines the same number of fellowships. We have granted 183 diplomas to 152 students taking the associateship:—In mining, 75; in metallurgy, 72; and in engineering, 35. Some of the students have taken more than one diploma, which accounts for the difference between the number of students and the number of diplomas. The council had granted 29 diplomas before the University touched the subject of mining. It must not be supposed that all the students of the School of Mines are taking associate or fellowship courses. There were 91 associate and 25 fellowship students last year. There were 1,618 individual students and 3,443 enrolments. School children are not included. The staff consists of 36 officers, with 14 cadets, who devoted their whole time to the school, and 20 lecturers who are not exclusively employed in its work. The annual expenditure in salaries amounts to £7,053. From 1906 to 1910 the Government contributions towards the cost of the school were £27,869, while revenue from fees reached £13,310. With the growing tendency to reduce fees that must be regarded as a diminishing source of income.

Are you surprised that the University wishes to take over some of the work now being done at the School of Mines?—To be quite candid, I must admit that I am not. There has been a corresponding movement throughout the world. In cases where no school of mines or technical school existed there has been no trouble. The extension of work has taken place, and the universities have been regarded as simply adapting themselves to the altered requirements of the times. "Culture," so called, was the chief aim of university work 25 years ago, but things have changed, and, although the fact is deplored in some quarters, education, as carried on by universities to-day, does not disregard the necessity of many of their students devoting themselves to what have been described as "bread-and-butter" subjects. This is, perhaps, rather a lowering of ancient ideals, but we live in a strictly utilitarian age, from which there is no escape. Having made these admissions, it will not cause surprise when I add that the Council of the School of Mines do not view with special satisfaction the disposition of their neighbour to take from them departments which they initiated, and which they have carried on to the entire satisfaction of the public. The school has furnished the mining world with some of its best-known and most capable men.

But would not the diploma of the University have greater value in the mining world than the diploma of the School of Mines?—Certainly not. Otherwise the University would not have been so anxious to secure for its students the Fellowship of the School of Mines. If the mining school were taken over, I have no doubt at all that the name would be retained, and things would remain very much as they are at the present time. Little or nothing would be gained by the change, except that the University of Adelaide would have under its control all the work which is being done by other universities.

It would appear that you do not favour the transfer of the School of Mines to the Education Department. Is that so?—You are right. The work about which we are talking, if it be not done in a distinct institution as at present, should unquestionably be transferred to the University. That is its natural destination. The diplomas of the department would not compare in value with those at present issued, and if any change be made, the new diplomas should be those of the University.

According to the Act you have powers in connection with branch schools, technical schools in the country. Why were those powers not exercised?—It was intended fully to exercise those powers. They were exercised to a certain extent, but the council found that if they did not walk warily they would be creating in country towns hostility to the Adelaide school. The difficulty was as to money. The contemplated country schools had never been given any financial basis. The Minister of Education should have issued regulations, making their financial position clear and definite, but this was never done. Hence the hesitancy of the Adelaide school to take further action. But they have always advocated in regard to existing schools that in the matter of teaching and examination, so far as important subjects are concerned, they should be brought into line with the city school. This would not mean any interference with local management, nor would it in the least degree take from a country school any prestige which might properly belong to it. Quite the contrary. It would mean that their students would have the status as to work done of Adelaide students, and all their work would be credited to them in the event of their deciding to take diplomas at the Adelaide School. Judging by what we have heard lately, it might be supposed that a scheme of this sort is a novelty. Records of the school will prove that it is a reform which I have been advocating for years past, and with, I am glad to say, the cordial support of some of our country schools.

Should these country technical schools be under the supervision of the Education Department?—No doubt it could do the work, but it seems to me that the technical schools of the country should be branches of the Adelaide School, and that the whole should be under one management. But I may be reminded that this would be the case if the Education Department took over the School of Mines and the University. Just so, but Mr. Hartley, who was one of the most conscientious and capable men ever in the public service, regarded the supervision of primary education as providing more than sufficient work for one man. At Port Pirie the work is being done quite as efficiently as in Adelaide. The President is a graduate of the University, and he realizes the necessity for examinations being of the proper standard. It is impossible to have better direct supervision and administration than by a local President and a local board, provided you select the right people.

Sir Langdon urged that money was being vested in the high schools owing to the machinery of the School of Mines not having been sufficiently utilized. Instruction in domestic economy was an instance.

The Chairman—Ah, we'll give the Director of Education an opportunity to speak on that. I know what he will say—that his policy is more convenient. In view of the amount of money involved, I do not think that should be the sole consideration.

Continuing, witness said so far as he could ascertain, no care was being exercised in admitting boys into the loco. shops. They should have some examination regarding, at any rate, elementary fitness in education. A large number of the lads did not in the least appreciate the privilege of attending the School of Mines, and, through lack of education, were not in a condition to benefit from the instruction given.

[The Commission adjourned.]