

—Knowledge and Efficiency.—

Dr. Dorothea Pavy said that women's lack of efficiency was responsible for the fact that their requests in the big matters were often pushed to one side. Therefore they, and their organization, should be efficient, and gain definite expert knowledge. She thought that women's education, even in Adelaide, was neglected, and that there was a general opinion that such should be the case, because high education was unnecessary owing to women's future work in the home. The lack of education in science was the worst feature. Girls should be educated not less, but rather more, than boys; for they would have to do with matters of fundamental vital importance to the nation. To hold their own they needed more knowledge equipment to compensate for their lack of equal physical strength with men. More education for them was needed on the social, economic, and political side. Women were now forming themselves into groups—local, municipal, and the ones which achieved the greatest success were those formed of women who knew from their personal experience the sort of trouble they had to try to remedy. The official bodies in South Australia, which looked after the social side, did not include women. That being so how were women to fit themselves for the position? Constantly there were complaints of the lack

of women on the League of Nations; but were the women of Australia fitted for the position? To be so a woman must know something, and must know what she knew. The value of women representatives to the League was being realized, and they must be ready to fill the positions. Let them start by working at home. Women's eyes, thoughts, and understanding were needed at home and, to an extraordinary extent, they were not used. There were plenty of little things in Adelaide needing attention and, if women began to deal with them, they would be equipping themselves for settling the larger issues. Many things were refused women because the financial resources of the State do not permit it. Let women take a hand in the financial outlook. There were spendthrift women, as well as spendthrift men; but, as a whole, women economised. Let them use that power of economy for the benefit of the whole community. Women should start by working in the municipalities, where there should be women committees to take over special work which they might well do better than men. There were such questions as milk supply, establishment of more creches, housing, lighting of public parks, and the review of the law from the woman's point of view, all of which should be dealt with by them, and it was a splendid thing that the National Council was now going into many of those questions.

A comprehensive vote of thanks was passed on the motion of Mrs. C. R. Morris.

—Message from Lady Forster.—
The President read the following message, which she had received from Her Excellency Lady Forster:—I am sorry I cannot attend your annual meeting, but I hope to hear that you have had a year of successful effort in South Australia, and that the number of your associate members and affiliated societies is steadily increasing. In every part of Australia I find the National Council of Women is becoming more and more influential in forming a sound public opinion on social questions and in promoting co-operation and goodwill among those who are working in different ways and from different standpoints for the welfare of the community. I wish you every success in the work that lies before you, and I hope before long we may be able all to meet again at the interstate conference, and that it may prove as useful and inspiring as that held in Hobart last January, when the papers contributed by the South Australian representatives were so much appreciated.

—Officers.—
Officers elected:—Patronesses, Her Excellency Lady Forster, the Lady Mayoress (Mrs. L. Cohen), Mrs. E. W. Hawker; President, Lady Hackett-Moulden; Vice-Presidents, Mrs. T. R. Bowman, Miss Hilda Burden; Home Secretary, Miss Gertrude J. Jude; Minute Secretary, Mrs. M. A. Goode; Treasurer, Miss Phebe Watson; International Secretary, Mrs. Darnley Naylor; Committee, Lady Holder, Miss C. Barrett, Dr. Marie Brown, Mrs. Christophers, Mrs. H. E. Fuller, Mrs. A. K. Goode, Dr. Gertrude Halley, Madame Krakowski, Mrs. C. R. Morris, Mrs. E. A. Mayfield.

Articled? black + 27.0
Missing War Bond. Adul

A CHARGE OF STEALING.
From R. R. St. C. CHAMBERLAIN, hon. secretary Adelaide University Students' Society:—In 'The Advertiser' of September 26 appeared a paragraph stating that an articled law clerk had been arrested on a charge of stealing war bonds in the custody of his firm. The person who was prosecuted in the Police Court this morning (September 26) on a charge similar to that mentioned, was a clerk employed by a firm of solicitors, but, as we have ascertained by search in the Supreme Court, was not an articled clerk. As secretary of the University Students' Society, of which an articled law clerk is a member, I ask you to rectify the statement made, as in the circumstances you will see how serious the matter is to us.

Register 26.9.22
FIFTY YEARS AGO.

From The Register, Tuesday, September 24, 1872.

Another step towards the establishment of a University for Adelaide has been taken. On September 23 a meeting of the general committee was held, and the plan of operations as drawn up by the Lord Bishop, after being discussed and slightly amended, was adopted. It is believed that preliminaries will soon be arranged, and a course of lectures entered upon. The curriculum proposed is based upon the model of kindred institutions in the mother country, and will be seen to embrace an immense variety of subjects. Technology, with great propriety is placed upon the list. The constitution of the University has in view endowed professorships, the stipends to be supplemented by fees and Government grants. We are delighted to find that the subject is being taken up with so much warmth, and that the prospects to a successful issue to the movement are so bright. The financial difficulty in the way of the project has been greatly softened by the munificent proposal of Capt. Hughes, to grant £20,000, perhaps £30,000, towards founding the institution. This is an example of well-directed liberality which ought to excite the emulation of other wealthy South Australian colonists. If they, in proportion to their means, would give as freely as Capt. Hughes has given, the University would indeed be bounteously endowed.

AT CORDILLO DOWNS.
Perfect Eclipse Observations.

Mr. Dodwell's Report.

The astronomical party which went to Cordillo Downs to see the sun effaced had glorious luck. They saw it all, and saw it well. The sun-gazers were in charge of the Government Astronomer (Mr. G. F. Dodwell), who returned to Adelaide on Friday morning, armed with voluminous information and many photographs. He submitted to his Minister (Hon. G. Ritchie) a preliminary report. In it he said:—"Our advance party, in charge of Mr. A. L. Kennedy, chief assistant at the Adelaide Observatory, went to Cordillo Downs two months before the eclipse with the instruments, and had a very arduous journey of 400 miles, from Lyndhurst Siding to Cordillo Downs, as all the instruments and gear, including some



MR. G. F. DODWELL.

heavy packages, had to be taken through by pack camels, which meant that they had to be loaded and unloaded every day. The country is very dry, and the sand-hills, especially between Lake Blanche and Lake Callabonna, made travelling difficult. The Akkelanna Crossing over the Strzelecki Creek, and the country between Innamincka and Cordillo Downs were also difficult to negotiate.

—The Site.—
"When I arrived on August 28 the eclipse camp had been selected on a very convenient spot at the Cordillo Downs

homestead. Instruments had been erected, and a great deal of preparatory work done, including the taking of preliminary photographs of the stars in the region where the sun was to be eclipsed. These photographs were taken as the result of a suggestion by Sir Frank Dyson, Astronomer Royal of England, that we should test the accuracy of the theoretical time required for bringing up eighth magnitude stars about half an hour after sunset, when the light of the sky would be approximately the same as during the eclipse. Mr. Kennedy's photographs came out very well and gave us a good guide on this point. We then decided to give exposures of 20s., 30s., 60s., and another of 20s. on four plates taken with the Einstein camera lent by the Allegheny Observatory. During the course of the preliminary work Mr. Appleby obtained excellent photographs of the moon with the Lick Observatory 40-ft. Coronagraph. This gave an image of the moon about 4-in. in diameter, and we were able to test the focus of the lens and adjustment of the rate of the driving clock.

—Ideal Weather.—
"Conditions at Cordillo were ideal for astronomical photography, clear skies and steady atmosphere being almost always the rule. Mr. and Mrs. Murray, of Cordillo Downs, were very kind to members of the party and facilitated their work greatly. Professor Kerr Grant, of the Adelaide University, arrived at Cordillo on September 3. About a week before the eclipse Professor Woolnough and his geological party from Sydney joined us. They had an interesting journey, first across ice and snow in the Blue Mountains, and then up through the dry interior. They brought with them a wireless transmitting plant with which they established direct radio communication with Adelaide.

—Through the Ether.—
"Our advance party had previously set up an aerial and being supplied with a receiving set had been able to receive time signals and messages. We also heard the wireless concerts from Melbourne, which, though at times faint and interfered with by atmospheric conditions, were frequently quite distinct, and we could recognise such items as the "Bonnie Banks of Loch Lomond," and "God save the King." The establishment of wireless communication between a sheep station in the interior of Australia and the capital was a feature of this occasion, and demonstrates to settlers in the outlying parts of the State the advantages which will come by making use of wireless. Thus Mr. T. Barr Smith, while with us, received results of the Adelaide wool sales on the day of the sale. Three days before the eclipse Messrs. T. Barr Smith, Ivo and Adamson, of the Beltana Pastoral Company, which owns Cordillo Downs and adjacent stations, and had invited the expedition to this station, arrived from Adelaide and took part in the observations on the day of the eclipse. Dr. MacGillivray and Messrs. W. E. Heywood and P. D. Riddell, of Broken Hill, reached the camp on the day before the eclipse, and gave us valuable assistance. Mr. Riddell assisted Mr. Barr Smith in the time-keeping, on which all the operations during the fleeting four minutes of totality depended, and Dr. MacGillivray contributed an excellent sketch of the chromosphere and corona, which he kindly gave to be included in the official records of the event.

—Awaiting the Moment.—
"On the Monday and Tuesday before the eclipse a change in the weather occurred, and clouds of dust blew up before a strong southerly wind, but after that the sky took up its usual condition of perfect clearness, and the day of the eclipse broke with an ideal sky for the observations. There was a somewhat strong breeze in the morning, but it died down towards midday. For some days and evenings beforehand, observers had been drilling so as to go through the programme without any hitch, and when the eclipse took place instruments and observers were in a thorough state of preparation. The first contact of the edge of the sun took place within two seconds of the time calculated by Mr. C. J. Merfield, of Melbourne Observatory. Professor Woolnough and Mr. Adamson took photographs of the partial phases at regular intervals with the Adamson instrument, Mr. Ivo acting as recorder. The light gradually failed as the eclipse proceeded, and all observers took their posts 10 minutes before totality, in readiness for the impressive moment when the moon completely obscured the sun, and the chromosphere and corona appeared with their indescribable beauty. Some time before this great numbers of galabs came flying in from all directions, being evidently perturbed by the diminishing of the sunlight. Camels and other animals at the station showed uneasiness. Shadow bands appeared rippling over the surface of the ground for 30 seconds before totality, also just after totality. Their appearance and direction of motion were noted down by Mr. Wallace Johnson, Mr. Kennedy, and others.

—A Magnificent Picture.—
"A weird darkness spread over the scene, and hurricane lanterns were needed by Mr. Barr Smith and Mr. Riddell in order to see their watches in calling the time. At the instant of totality the word "go" was called, and during the next four minutes every one was occupied handling and taking plates, making photographic exposures, using the guiding devices of the telescopes, and so forth, with clockwork precision, and a valuable series of photographs has

now been obtained. These are all being brought to Adelaide for development. Professor Grant, Mr. and Mrs. Murray, and Mr. Dixon, of Professor Woolnough's party, joined with me in the work with the Einstein camera. Messrs. Appleby and Kindler were in charge of the 40 ft. coronagraph. During totality the appearance of the eclipsed sun was impressive and beautiful in the extreme, surpassing any idea that

had been formed from any word, description, or photograph. The moon stood out as an inky black object, its circular outline surrounded by the red fringe of the chromosphere, and this again by the pearly light of the corona.

—Rift in the Corona.—
As seen from our station the corona wings extended vertically above and below the sun, the polar tufts being on the right and left-hand sides. Two main streamers extended beneath the sun to more than one and one-third times the sun's diameter, that is, about one and a half million miles from the sun's lower limb. On the upper side there was one principal streamer and another shorter one. Several observers also noticed a peculiar dark rift in the corona. The planets and stars to the second magnitude were visible in the deep blue of the sky. As mentioned before in addition to the coronal photographs four plates were taken with the Einstein camera of the faint stars in the immediate vicinity of the sun, also of the comparison field five degrees away on two of these plates, and a great point of interest centred in whether these stars are displaced in accordance with the Einstein theory. The Astronomer Royal kindly offered to measure our plates, and it is probable that they will be sent to Greenwich Observatory for measurement with the special measuring machines there shortly after they are developed. In addition to these photographs, spectrographic exposures were made by Professor Woolnough, with apparatus designed by Professor Grant, with a view of getting the spectrum of the fainter part of the corona. Professor Woolnough and Mr. Adamson also took coronal photographs with the Adamson instrument, giving long exposure to bring out the faint extensions of the corona, and Mr. Adamson also made a drawing of the corona. Mr. Kennedy took special magnetic observations during totality, and also during the three days before and after the eclipse, in connection with the programme given by the Carnegie Magnetic Department.

—Wireless Puzzle.—
Messrs. Thrum and Bowen noted a complete cessation of wireless signals during totality. This was a quite unexpected phenomenon. They also took observations of the strength of signals from various Australian radio stations during the progress of the eclipse. The end of totality was marked by a brightening up of the lower limb of the sun, and almost immediately afterwards a very brilliant point of light appeared—the sun's returning edge. Light rapidly increased, the corona was instantly blotted out, and the most important phase was over. A further series of photographs was taken to determine the time of the last contact.

—In Need of Rain.—
"The majority of the party is returning via Broken Hill, and on the way will pass over the historic country traversed by Burke, and Wills and Capt. Sturt. We saw the country at its worst, and badly in need of rain, but in parts where permanent water still remains the growth of vegetation and bird and animal life provided a very pleasing contrast. All along the way the people at various homesteads showed the party a hearty and hospitable welcome. The ride was rough in places, and great care had to be taken of the valuable plates."

Advertised 30th
Professor Mitchell

It is reported that Professor Mitchell intends to resign the Chair of Philosophy at the University. It is possible that he may be succeeded by Dr. McKellar Stewart, associate professor of philosophy at Melbourne University. In the event of his resignation, Professor Mitchell will still continue to be vice-chancellor.

Herald 30/9/22

WORKERS' EDUCATIONAL ASSOCIATION.
Short course class in Public Speaking, by Dr. Heaton and Mr. G. E. Hale, B.A., now being formed. To commence third week in October. Fee for course of six lessons, 2/1. Names are being enrolled for a short course class in Political Science by Dr. Poole, to commence Friday, October 12th, at 8 p.m. Fee for course of six lectures, 2/1. These classes will be held in the University, University West Wing, Adelaide.
Tel.—6910. G. MCRTICHELLE, Gen. Sec. W.E.A.