



THE NEWSLETTER OF THE
ROYAL ASTRONOMICAL SOCIETY OF CANADA - KINGSTON CENTRE
AND THE
QUEEN'S UNIVERSITY ASTRONOMY CLUB

Mar. 3, 1978.

Greetings and clear skies for the month of March!

An Outstanding Talk By A Very Special Guest

The members of our Centre who attended the last meeting enjoyed a rare and special treat when they heard the talk given by the Honorary President of our Centre. To thank Dr. Douglas for her talk and for the time she shared with us, we wish to pay an overdue tribute by dedicating this newsletter to her and by saying a few words about her presentation.

One of the outstanding Canadians involved in Astronomy, Dr. A. Vibert Douglas has been associated with the R.A.S.C. for over fifty years, serving it in many capacities including that of National President in 1943 and 1944. Those who heard her talk perhaps know one reason why she has long been a recognized authority on the history of astronomy: she worked with and knew very well the people who contributed to the science in the present century - she was one of them. It is with pride that we can say we know someone who worked with Sir Arthur Eddington, the great cosmologist and early exponent of a Relativity, and someone who worked at Yerkes Observatory when the world's largest refractor was adding to our knowledge of the universe.

There could have been none in this country better equipped to talk to us on the topic of the International Astronomical Union because no other Canadian has attended as many of its triennial congresses.

The following review of Dr. Douglas's presentation was written by David Levy and I wish to thank him very much for sending it to me.

The I.A.U. And Its Triennial Congresses: A Talk By Dr. A. V. Douglas

Once in a very long while someone delights the members of an RASC centre with a talk of such exceptional quality that one leaves in a deeply-moved, semi-transcendent state. Such was the feeling I had after hearing Dr. A. Vibert Douglas share her vast personal experience of astronomical history and the I.A.U.

The opening sentence of her splendid talk set its tone -- that on Jan. 14, 1925 she gave her first address to a centre of the RASC, and fifty-two years later she is "still at it". Her latest talk, before the Kingston Centre, on February 21, 1978, was entitled The IAU and its Triennial Congresses, and she began by describing the 1918 organizational meeting in Brussels, and subsequent meetings in Rome in May, 1922, and in 1928. Thirty commissions were

set up, Commission 1 being, called Relativity "since that was such an exciting thing in those days." At the time, she was working at Cambridge on absorption spectra and at the meeting managed to talk with Dr. Alfred Fowler of the University of London -- "an outstanding spectroscopist" -- about her studies. Unfortunately the good scientist spoke with a pronounced slur and he told Dr. Douglas that they were investigating a new line called "C8". "I was absolutely mystified - I had no idea what 'C8' was she said - and it was only later that she finally realized that he had really said "CH". She recounted also how she had met Albert Einstein a year before his death and had asked him who he thought were the world's greatest intellects." "His answer, straightaway, was 'H A. Lorentz.'" "Anyone else?" "If I had met Willard Gibbs I might have included him, but I have never met him."

Her recollections, in connection with the fourth I.A.U. Congress at Cambridge, Mass., included an exciting but disappointing trip to Magog to see the 1932 total eclipse of the sun during which "we stood under a cloud." This personal reminiscence was particularly interesting for me as I had examined part of the Montreal Centre's extensive file on that expedition.

As a projected I.A.U. assembly at Copenhagen in 1939 was cancelled due to the outbreak of the Second Great War, the next full assembly was in Zurich, after the War and Dr. Douglas "attended this meeting and every one since then. An exciting aspect of this meeting was the formation of a new commission for radio astronomy. This happened surprisingly late as "the whole of the thirties had gone by without any real advancement in this field." The vast improvement was really a result of the necessities of war. At the same meeting, Dr. B. Lyot displayed a model of the new coronagraph he had just invented.

The Zurich conference was beset by the beginning of a political problem involving the USSR delegation. Apparently they had not responded to any of the I.A.U. requests for information, so when their delegation of 80 showed up on the second day of the congress, it took the meeting by surprise. Then, during the soup course of the banquet, the entire delegation stood up and stormed out of the hall. It took a few minutes for the perturbed organizers to understand that the root of the fuss was their own failure to include the USSR flag. One was hastily put up and the Russians reentered. The problem recurred at the next Congress, in 1952, at Rome. This time the Soviets refused to lecture in either of the two official languages of the Congress, Dr. Douglas recalled a conversation she had at the time with Harlow Shapley, who confided that he had asked a member of the Soviet delegation why they insisted in presenting papers in a language no one else could understand. He had replied, "Dr Shapley, do you not wish to learn Russian?" Shapley's retort was "No, not at my age!"

Dr. Douglas recalled a second dispute at the Rome meeting but this one was of a proper scientific nature between Kuiper and Hoyle on the origin of the planets. She was also able to meet Garibaldi's granddaughter.

The congress of 1955 was in Dublin and the one of 1958 was in Moscow. While there Dr. Douglas enjoyed the side trips to the Russian observatories in the Caucasus and to areas near the Black Sea.

At the 1961 congress at Berkeley, California, Jan Oort, "the only person who had attended every I.A.U. meeting since the beginning," finally was made President. She is urging McGill to grant Oort an honorary degree during next year's Montreal conference. "He is always friendly and approachable, and always can add something of value to a discussion." It was the 1954 Hamburg meeting that bristled with excitement over the first nine newly-discovered quasars. By the following meeting, in 1967, one hundred were known. She recalled Carl Sagan's "remarkable paper" on Mars at the 15th congress in Sydney -- and another Sagan paper on Mars equally remarkable at the 16th in Grenoble. During this France meeting she joined a group that visited the Pic du Midi Observatory, where Lyot had invented his coronagraph many years before.

During Dr. Douglas' presentation one had the sense of a presence of history. We were given a sensitive account of a procession of major astronomical discoveries of the twentieth century, observed, studied and remembered as friends by a prominent astronomer who had witnessed the birth and evolution of each of them. Her talk ended, not with an ending, but with a beginning: "The 17th I.A.U. Congress will meet in Montreal in August 1979. It will be my twelfth. I hope it will be your first."

Projects For This Month

Here are some observation projects which you can work on this month:

1. Comet observing. Do you know that a recently discovered comet will probably reach naked-eye visibility this month? The comet is known as (You guessed it! What else?) Comet Bradfield, and was the third comet discovered this year. It reaches perihelion on March 17th, and though it has recently been too far south to be readily seen, it should be noticed in a couple of weeks as it moves north through Capricornus, Aquarius and Pegasus.

You should be able to notice it in the south-east and then in the east, rising more than an hour before sunrise. If it follows predictions, it should reach 4th magnitude, and under favorable conditions you might be able to see it with the unaided eye.

2. The Moon and Aldebaran

Even if we do not see the lunar occultation of Aldebaran on Wednesday, March 15th, it should be interesting to observe how close the moon is to that bright star as soon as it becomes dark enough for the star to be visible on that date. Watch for it in the early evening.

3. Young Moon Observing

I have previously suggested that an interesting project is to see how young a moon you can see or photograph. This month we are provided with a reasonably good chance to work on that project if the skies are clear and we have a good location for viewing the western horizon on the evening of Thursday, March 9th. If those conditions happen to be favorable one of us could join the limited number of people who have seen or photographed a moon less than 24 hours old. It may be possible to see a very slender crescent of the moon within about an hour after sunset. It happens that Venus is very bright and very, very close to the place where we should be

looking for the moon: in fact it is only 2 degrees south of the moon only a few hours later the same evening.

If you happen to see the moon that evening, be sure to record your observations carefully and report them at the next meeting.

4. Observing Mercury

This month gives us the one time during the year, 1978, when we may have a fairly good chance of seeing the planet Mercury in the evening sky. On Friday, the 24th, the planet reaches Greatest Eastern Elongation, and for several days before and after that date it may be seen above the western horizon after sunset. It is brighter than 0 magnitude.

In the past, I have recorded occasions when I have seen Mercury, and I suggest that throughout the latter half of the month, a record be kept on time, altitude, and azimuth of every sighting of this fleeting planet.

Good luck and clear skies for these observing projects!

FOR SALE

An equatorial mount with clock drive (from a 10" Cave Astrola). It includes saddle with straps, setting circles, clock drive with 1" shaft, counter weight, pedestal, and permanent pier mount.

Canadian price was over \$400 in 1977.
Asking price is \$300 plus shipping.

Contact: Marg McKee
Box 197, R.R.#3 or phone: 239-5946 (office)
Manotick, Ontario 692-3685 (home)
K0A 2N0

March Meetings

Don't forget the meetings this month:

1. Tuesday, March 7, 1978: Observing Variable Stars: A Presentation By David Levy
2. Tuesday, March 21, 1978: Elections of officers for next year and Moon Observing (weather permitting)

"SEE YOU THERE"



Royal Osteological Society of Canada - Kingston Centre
and the
Queen's University Centenary Club.

Candidates For Executive For the year beginning Sept. 6, 19

Honorary President: Dr. A.V. Douglas.

Past President: Leo Enright

President: Denis Belanger

Vice-President: Mike Payette

National Council

Representative: Doug Baker

David Levy

Secretary-Treasurer:

~~Susan A. D. Galt~~

Editor of Newsletter:

Leo Enright