81 Collins Street,
MELBOURNE, C.1.

22-7-47.

Dear John,

The main facts re the medical condition of the C.C.R. men from Canberra are given below. You will know the details of their exposure.

They worked alternately in the tanks without masks for ten minutes at a time; this was all they could stand. Their symptoms were then more of difficulty in breathing rather than of sneezing and running from the eyes, such as usually occur from this lead exposure.

On the Sunday night they arrived down from Canberra and were given immediately large doses of sedatives and B.A.L. (dimercaptopropanol), otherwise British anti-Lewisite - in doses of 4½ milligrams per kilogram of body weight four hourly. One man was obviously very sick, the other not so bad. Their early symptoms which were apparently headache and vomiting were attributing in Canberra to a gastro-intestinal infection which was epidemic there then. As you know, I stood by to go to Sydney at once if Dr. Blackburn's next report was unfavourable (he had not seen the really sick man when I talked to him at midnight on Sunday - he was still awaiting his arrival from Canberra), but by midday on the next day, Monday, both men were apparently quite fit after four doses of B.A.L.

Dr. Blackburn then reduced the dose to half the previous dosage (i.e. 2¼ mgs. per Kg.) and gave it only twice daily.

On the following Friday, four days later, one man suddenly became violent, escaped from the ward and nearly from the hospital grounds and it took four men to hold him down. He also had a fit that afternoon.

Dr. Blackburn, who had promised to communicate with me at once if things were not going well, rang me that night and I urged him to increase the dose of BAL to its former level of 4½ mgs. four-hourly, since I thought he had cut the dose down too soon. This was done to both men and the less sick man has now been B.A.L. for some days and really has been all right, apart from being apprehensive, from the Monday, the first day after his admission.

The other man did well but, when the dose of B.A.L. was again reduced, he tended to relapse, so these very large doses were continued for some days after this. When Dr. Blackburn was rung up by me last week-end, he told me the man was quite all right, though he was still giving him one dose of B.A.L. per day but intended to stop it next day. I think we can consider both of them as cured.

On one occasion the very sick man got severe abdominal pains while on B.A.L. I do not know the exact significance of this but one man with ordinary lead poisoning (a battery worker) who, at my suggestion, was given BAL at the Royal Melbourne Hospital two or three days after admission with lead colic which meantime had responded to calcium given intravenously, got a very severe relapse of his colic when given B.A.L. I thought this might be due to the extra lead in the circulation under the influence of B.A.L. There is a more rapid excretion of other heavy metals under the influence of B.A.L. and presumably this will happen

.th lead.

Though Dr. Blackburn does not feel he has scientific proof that B.A.L. achieved a cure here, I feel on the story he gave me that it undoubtedly played a very big part in his cure and I think if large doses had been continued for the first week to ten days he would not have relapsed at all. Dr. Blackburn feels himself that the B.A.L. was a very important factor in this cure but he does not feel he has scientific proof of this.

I feel sure that, whatever BAL may do in ordinary cases of lead poisoning, in early cases of lead encephalopathy it will be life saving if used in large doses for a period of, say, ten days. And this is the type of poisoning we meet with T.E.L.

With best wishes,

Yours sincerely,

sgd. Keith D. Fairley.