

# RESHAPING THE FACE OF AUSTRALIA!

Right throughout Australia men and machines are changing the face of the earth, moving mountains, changing the flow of rivers —in short developing Australia.

On most of these jobs, from tunnelling in the Snowy to digging post holes for fencing, you will see Tutt Bryant equipment, for Tutt Bryant is Australia's foremost earthmoving and construction organisation.

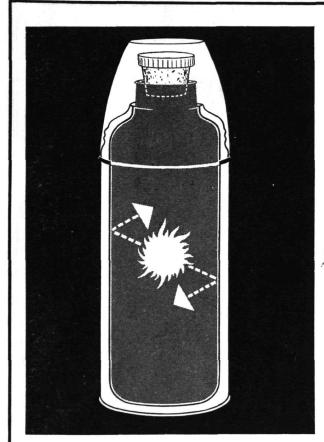
Tutt Bryant have achieved this leadership through sound business methods and because they have a range of equipment to suit every need. Add to this the fact that they have invested millions of pounds in a chain of service and parts centres that encircles Australia and you can understand why Tutt Bryant deserve such recognition.



(N.S.W.) PTY. LTD.

SOUTH STREET, RYDALMERE

Service Centres throughout Australia



# How to keep your home COOL in summer

(and warm in winter)



# and save all the way . . .

Because of the extremes in temperature in Australia, ranging from freezing and near freezing conditions in winter to broiling heat in mid-summer, effective insulation is one of the most important considerations confronting the home maker. Whether you build with timber, fibro, brick, stone or concrete, the ultimate temperature-comfort of your home will depend largely on efficient insulation. In this field, there are many different methods and materials but because of the cost factor involved, thousands of beautiful homes are still being built without due regard to comfort. Until comparatively recent years, the bulk of home insulation was carried out with "low conductor," mineral wool and fibre-type materials. These materials, apart from being bulky, were frequently heavy and costly to install, moreover, over the years they were inclined to "settle" and so lose efficiency.

The American Sisalkraft Corporation, which has long supplied the vast sheathing and sarking requirements of North America set out to tackle this problem: How to produce a thoroughly effective, but lightweight, low-cost home insulating material. Their research led them to what is called reflective insulation. One of the oldest and best-known examples of using this reflective principle is the ordinary vacuum flask, which employs a silvered glass liner in conjunction with air space. Although various metals such as polished silver, copper or iron, reflect high percentages of radiant heat, aluminium has proved to be the most economical, efficient and durable metal for use as a reflective insulation. Their new product was an immediate success! Marketed throughout the world as SISALATION and now produced in Australia, it is actually a 6-ply reinforced SISALKRAFT to which is bonded on one or both sides, highly burnished aluminium foil.

This means that in addition to insulating, it gives perfect moisture and draught protection.

Yes, you can keep your home cool in summer, warm in winter . . . and the cost? Approximately 50 per cent. of other methods. Write today for full particulars to—

SISALKRAFT DISTRIBUTORS PTY. LTD., 16 LOFTUS ST., SYDNEY. PHONE BU 5415 • SISALKRAFT DISTRIBUTORS PTY. LTD., BRISBANE • SISALKRAFT DISTRIBUTORS PTY. LTD., ADELAIDE • AUSTRALIAN REINFORCED PAPER CO., PERTH • SISALKRAFT DISTRIBUTORS CO. PTY. LTD., MELBOURNE • WILLIAM CROSBY & CO. PTY. LTD., TASMANIA.



More additions to the ever-expanding range of Cooper Veterinary Products—helping **you** in the continuing search for more effective treatment of animals.

### COOPER'S UTERINE PESSARIES"

For the treatment and prevention of post-partum infections in large animals associated with or following retained placenta, dystokia, sub-acute and chronic metritis, and pyometritis.

### "COOPER'S PARASITIC DUSTING POWDER"

For the destruction of fleas, lice and ticks on animals and poultry.

### "COOPER'S OTODECTIC MANGE DRESSING"

For the treatment of parasitic otitis in dogs and

cats and for local application to intractable lesions of sarcoptic mange in dogs.

### "COOPER'S ANALGESIC EYE DRESSING"

For the treatment of acute and chronic eye infections, conjunctivitis, blepharitis, etc. For allaying irritation caused by the presence of foreign bodies and the alleviation of pre- and post-operative pain.

### • ''COOPER'S VETERINARY DISINFECTANT'' and "'COOPER'S DIELDRIN DOG WASH"

Further information on request:

WILLIAM COOPER & NEPHEWS (AUSTRALIA) PTY. LTD., P.O. BOX 12, CONCORD, N.S.W.

C.204.HP

# **MINSON SCIENTIFIC COMPANY**

### MANUFACTURERS OF HIGH-GRADE GRADUATED GLASSWARE FOR THE VETERINARY RESEARCH WORKER

**Volumetric Pipettes** 

Graduated Pipettes

**Artificial Insemination Pipettes** 

Send us your inquiries for any special apparatus

# MINSON SCIENTIFIC COMPANY 86 CASCADE STREET, PADDINGTON SYDNEY, N.S.W.

FA 8553

FA 8553

4

# The new HOLDEN is gloriously new!

CENTAUR

Pictures and words can give you some idea of the glorious things that have happened to Holden. But the real thrill lies in seeing and driving the car itself. For the new Holden is wonderfully styled inside and out. It's longer, lower—with a new radiator grille, new hooded headlamps and completely new lines from bonnet to boot. And when you sit comfortably back in one of these new Holdens you'll be conscious of many other great new

features. Like the smart new instrument panel, the 40% greater vision, and the beautiful upholstery in new colours. You will find more room— $2\frac{1}{2}$ " more in front and nearly 3" in the back.

•'Air Chief' are the only Car Radios specially designed for the new Holden. •Convenient GMAC hire purchas. strangements are available. But the new Holden story doesn't stop at styling. There's finer performance. There's new handling ease and a new experience of comfort and safety in a family car. Whether you compare today's car values by sheer good looks, by performance, by comfort, by safety or by price you'll find a combination of all these values in the new Holden that you won't find in any other car.

It's open house now at Holden showrooms everywhere.

The new models are on display, ready for your inspection and trial. See them —drive them, and we think you will agree that Holden is now more than ever Australia's best car buy.

```
LIST PRICES FROM £910
PLUS SALES TAX
T144
```

**GENERAL MOTORS HOLDEN'S LIMITED** BRISBANE • SYDNEY • MELBOURNE • ADELAIDE • PERTH

**HOLDEN\*** 

Australia's Own Car

\*REGISTERED TRADE MARK

Sold and serviced by Holden dealers throughout Australia

# LAND

(Official Organ of the Farmers & Settlers' Association of N.S.W.)

(Member of the Audit Bureau of Circulations.)

# Has the largest circulation of all N.S.W. farm weeklies

The Reason: To readers and advertisers alike it gives unrivalled value.

Readers like "The Land" because it gives all the news plus a wealth of useful practical information designed to save time and money on farm and station.

Advertisers like "The Land" because it brings them outstanding results.

#### Annual Subscription Rate: 32/6, post free.

On sale at all newsagents.

Advertising rates on application.



# PHILIPS equipment for VETERINARY use

### INFRA RED (Table & Stand Model)

This equipment can be used for either general or local exposure. The general exposures are chiefly used for rheumatoid conditions. The local exposures are mainly used following fractures, dislocations, etc. The portable table model has weighted base thereby ensuring stability in any position. Floor model has counterbalanced control arm to facilitate adjustments. Both models finished in chrome with black baked enamel.

### **CAUTERY & LIGHT APPARATUS**

As its name implies, this dual-purpose apparatus supplies two types of current; one output with variab'e control supplies power to a lamp which the operator uses for close cavity inspections. The second output supplies current for a platignum cauterising burner for removing warts, skin cancer, etc. Unit is compact and easily portab'e, features built in compartment for accessories.



PHILIPS ELECTRICAL INDUSTRIES PTY. LTD. SYDNEY • MELBOURNE • BRISBANE • ADELAIDE • PERTH • HOBART

PG29-56

# FURTHER OUTSTANDING SUCCESS TO OSMONDS' BARNOLDBY STUD AT PERTH (SCOTLAND) SHOW, 1956

Right: Supreme champion, Black Baron, sold for 16,000 gns. sterling.

Pinky Pride — female champion — sold for 3,000 gns. sterling, the highest price ever at Perth for a heifer, and the first time that male and female champions have been exhibited by the one breeder.

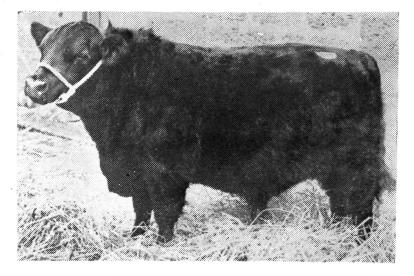
### BLACK BARON OF BARNOLDBY

Calved 10/2/'55. Sire, Protus of Greenyards; dam, Black Brenda of Barnoldby.

🛨 Supreme Champion. -

- Breeders' Champion Challenge Cup.
- 📥 Aberdeen-Angus Society Medal.
- 🖌 Serriar Champion.
- + Derculich Cup.
- + Three Firsts and one Second.

OSMONDS extend a cordial invitation to Australians visiting England, to inspect the research farms at Grimsby.



### MATCHMAKER OF BARNOLDBY

Calved 7/3/'55. Sire, Protus of Greenyards; dam, Modella of Beelsby. Reserve Junior Champion.

#### Groups

- ★ Downsbragh Trophy for Best Group of Five by the one sire.
- ★ Pedro Estanguet Cup for Best 3 Bulls.
- ★ Auctioneers' Silver Challenge Cup for the Best 3 Bulls.
- ★ Harviestoun Cup for Best 2 Bulls.
   ★ Fordhouse Challenge Cup for Overall Champion

#### Heifers

- Female Champion, Pinky Pride.
- Aberdeen-Angus Society Rose Bowl.
- Gaidrew Challenge Cup for Best 3 Heifers.
- Argentine Perpetual Challenge Cup for Breeder with most points. (First time competed for.)

Culminating 5 years of

earlier success.



FOR DIPS, STOCK FOODS AND VETERINARY REMEDIES TESTED AND PROVED ON OSMONDS' ENGLISH FARMS

OSMOND & SONS (Aust.) Pty. Ltd. 56 O'RIORDAN ST., ALEXANDRIA, N.S.W. MU 1615

"Health and healing on the farm"

# CENTAUR 7 **RESEARCH and DISCOVERY**

Not a ble contributions to Chemotherapy have been made during recent years by scientists working in the Research Laboratories of Imperial Chemical (Pharmaceuticals) Limited. Their activities have brought to light a number of new drugs which today are of outstanding importance in medical and veterinary science. A few of them which have found world-wide application are mentioned here, but a list of the full range of IC(P) products for use in veterinary practice will be gladly forwarded on request.

# **IC(P) VETERINARY SPECIALTIES**

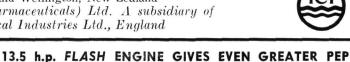
 "AVLINOX"—For frothy bloat in ruminants.
 "AVLOPROCIL"—Penicillin.
 "CETAVLON"—Detergent and bacteriostatic.
 "CETAVLON" UDDER CREAM
 —To assist in the control of streptococcal mastitis.
 "HIBITANE" — Pessaries and Intramammary Cream. "LOREXANE"—Gamma B.H.C. Dusting Powder and Aerosol Spray.

"MYSOLINE"-For Epilepsy.

"SULPHAMEZATHINE" — The Sulphonamide of choice— Powders and Solutions.

"TETMOSOL" — Sarcopticide solution and soap.

Marketed in Australia by **IMPERIAL CHEMICAL INDUSTRIES OF AUST. & N.Z. LTD.** All Capital Cities and Wellington, New Zealand Products of Imperial (Pharmaceuticals) Ltd. A subsidiary of Imperial Chemical Industries Ltd., England





AND VERSATILITY, PHENOMENAL ECONOMY!

# ELYSÉE

1300 SALOON

It's the most exciting new car of the year — the brand-new, grand new Simca "Elysée," magnificently powered by the just-developed 13.5 h.p. Flash engine. In performance, style and comfort, "Elysée" surpasses even its famous Aronde predecessor to win the title of "finest French car ever!" Test-drive the "Elysée" now. Get to know its lightning acceleration, its precision of control and superb road-handling qualities. Thrill to the power of its new, silent engine and see how much more beauty, more spaciousness French design and craftsmanship have given—then choose your "Elysée"—the one with the most beautiful two-tone interior!

CALL AND SEE IT TO DAY AT YOUR LOCAL DEALER OR NEW SOUTH WALES DISTRIBUTORS YORK MOTORS (Sales) PTY. LTD., 101-111 WILLIAM ST., SYDNEY. FA 6621

# VETSERA VETERINARY BIOLOGICALS

EGG-ADAPTED, MODIFIED CANINE DISTEMPER VACCINE (Living)

### CANINE ANTI-DISTEMPER SERUM

For the treatment of Canine Distemper in the early stages of infection.

### CANINE DISTEMPER IMMUNIZATION OUTFITS

For the active immunization of dogs against Distemper by the Laidlaw-Dunkin living virus-serum method.

### NORMAL CANINE SERUM

For the treatment of Haemorrhage, pre and post-operative debility, toxaemia, dehydration, hypoproteinaemia, etc.

# "Vetsera" Biologicals are available to the Veterinary Profession only

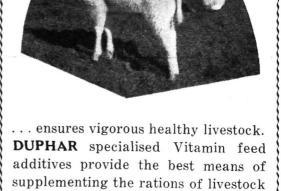
Rail and postage to our account.

Further particulars obtainable from

VETSERA PRODUCTS 47 ANDERSON AVENUE MT. PRITCHARD - - N.S.W.



**SCIENTIFIC** 



- freedom from disease
- survival after birth
- rapid, healthy growth
- improved fertility

to maintain\_\_\_



PHILIPS-ROXANE(Aust.)PTY. LTD. 69 Clarence Street, Sydney

# For Simplified Antibiotic Therapy . . .

# **CHLOROMYCETIN INTRAMUSCULAR**

Chloromycetin Intramuscular, a notable addition to the range of Chloromycetin products, is specially prepared in a microcrystalline form for use as an aqueous suspension by deep intramuscular injection. With this new preparation, not only is treatment simplified, but the whole scope of large animal Chloromycetin therapy is considerably extended.

Dosage may be calculated on the basis of one to two mg. per pound body weight for large animal patients. The recommended dosage for small animals is 5 mg. per pound body weight daily.

### The Department of Veterinary Medicine PARKE, DAVIS & COMPANY, LIMITED G.P.O. Box 4198, Sydney

# Arthur Muston & Sons

### ★

Manufacturers of: "Pilot" Antiseptic Cleanser "Lyptozone" Eucalyptus Soap "Euliptol" Eucalyptus Deodorant "Gleemol" Pumice Soap

### ★

Tel.: BU 3025 Telegrams: "Mustonsons" 45 PHILLIP STREET, SYDNEY



## **Provender Milling Specialists**

Engineering Division All Plant for Stock Feed Manufacture

Consulting Division - Analytical and Research Division - Stock Feed and Provender Milling News Bulletin

### 171 SUSSEX STREET

BX 6301

SYDNEY



10





# **RIVERINA STOCK FEEDS**

There's no doubt about

Major Prize Winners of the 1956 Sydney Sheep Show prove you can rely on Riverina Stud Meals

Prize winning breeders use and recommend "Riverina" products both Standard and Special Meals. Among the famous names raising top-class merinos on "Riverina" Stud Meals are Mungadal, Uardry, Boonoke, Haddon Rig, Eschel, Merryville, Winbri, Echo, Oakbrook and Koonwarra.



Manufactured by RIVERINA STOCK FEEDS PTY. LTD.

Sydney Office: 10 MARTIN PLACE Phone BL 3178.

Narrandera: Phone Narrandera 29 and 124.

Tocumwal: Phone Tocumwal 35.

Wallangarra (Q.): Phone Wallangarra 2.

IRUIRAL IBANKI HOIH INKSAWA

The Bank that outgrew its name

There was a time when our name, Rural Bank, meant little more than that. However, such has

been the support of the public that today, as a full trading bank, the Rural Bank makes money work through Industry, Commerce and Home Building, as well as Agriculture.

RURAL BANK A Full Trading Bank Head Office: MARTIN PLACE, SYDNEY. Board of Commissioners C. R. McKERIHAN (President) J. C. FLETCHER BRUCE S. SMITH The Pharmacy Press Pty. Ltd.

121 Day Street, Sydney

Phone: MA 5490

### \*

Half a century of service to Veterinary Surgeons, Doctors and Pharmacists for all their printing requirements.

### $\star$

Labels, Prescription Forms, Envelopes Stationery, etc.





For Cattle, Pigs, Sheep and Poultry. Capacities: 300 lb. to 1,000 lb. With direct coupled electric motor or belt drive.

Motorised models can be fitted with Feed Grinders for Oats, Wheat, Corn, etc. The mixers can also be used for concrete block making.

Particulars.

Bonser Engineering Co.

Merrylands, N.S.W.

YU 2513

YU 2513

in the horse

WELLCOME'

Injection of SUXAMETHONIUM CHLORIDE

★ Literature will be sent on request to Box 1485. G.P.O., Sydney.



BURROUGHS WELLCOME & CO. (AUSTRALIA) LTD., SYDNEY, N.S.W

STAINLESS	STEEL
-----------	-------

# **VETERINARY SURGICAL INSTRUMENTS**

ALLEN & HANBURYS (Australasia) LTD.

41 HUNTER STREET, SYDNEY — —

BW 3640

Carry a FULL RANGE of Stainless Steel Surgical Instruments used in Veterinary Surgery, manufactured by ALLEN & HANBURYS LTD., London, and we cordially invite you to inspect our stock.

All Mail Orders will be promptly attended to, and a current Price List will be forwarded on application.

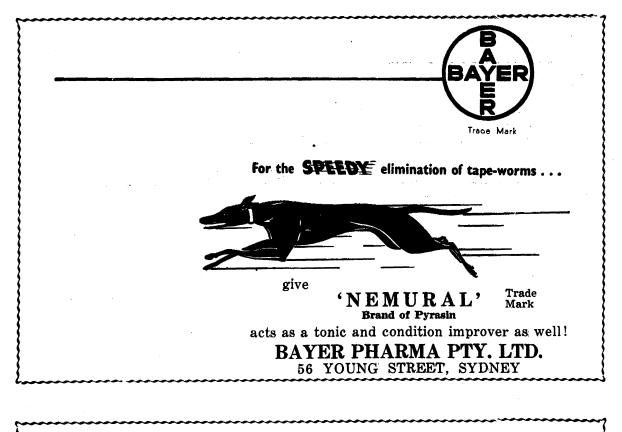
# A. and C. E. ARTHUR-SMITH

# DOG BOARDING KENNELS

# BOBBIN HEAD ROAD - - TURRAMURRA NORTH JJ 3034







# **"COUNTRY LIFE"**

# CHAMPION OF THE LIVE-STOCK INDUSTRY AND ITS ALLIES

Official Organ of the Institute of Inspectors of Stock.

Recorder of all events of interest to Veterinarians and Stock Owners.

Annual Post Free Subscription, 30/-. Order from your Newsagent or COUNTRY LIFE NEWSPAPER CO. LTD.

::

::

::

SYDNEY

The Journal of the Sydney University Veterinary Society

# CENTAUR

# 1956

Editor: M. E. A. CARTRIDGE

Assistant Editor: G. D. C. COLEMAN

Number Eighteen



### ACKNOWLEDGMENTS\_\_\_

We extend our thanks to all members of the staff and the student body who made contributions to Centaur.

We would particularly like to thank Mrs. Poland and Mrs. Pearce for making such an excellent job of manuscript typing.

We gratefully received an interesting copy of the University of Queensland Veterinary Student's Association Journal, "Apsyrtus."



Veterinary Science covers an immense field; a field so enormous that it is not surprising to find considerable competition between its major branches for the largest slice of the carriculum. It is no more surprising that certain aspects of Veterinary Science should dominate the course from time to time to the detriment of others and the general good of the profession. Over many previous years the laboratory and clinical sciences have overshadowed the no less real and important sciences of animal management. So far has the situation deteriorated that we find the key men in these fields today-the field that should be the Veterinarians—occupied by others. With the training received in the physiology of the domestic animals in health and disease, who is better qualified than the Veterinarian to take a place in the field of animal husbandry? We grant that the prime function of the Veterinariran is to treat the clinically ill. However, the greatest sources of economic loss to the nation in its animal industries, are those animals who through chronic disease, parasite infection, or mild malnutrition are subclinically ill. The sciences of animal husbandry in their broadest sense are directed at dealing with these animals and so are worthy of the strongest support from the future members of the Veterinary Profession.

1956 has seen both the institution of a new Department of Animal Husbandry and a strict revision of lecturing schedules. We believe that the sudden introduction of the new Department and the simultaneous reorganisation of lecture times has been most unfortunate and directly responsible for the unsettled, transitory nature of the current academic year.

The reorientation of lecture and practical classes has given the whole Faculty a free Wednesday afternoon. Representing, we believe, the great majority of student opinion, we feel bound to express our satisfaction and gratitude for this, the most satisfying feature of the academic year 1956. It matters little whether it was utilised privately or corporately as long as it was put to good recreational use.

We know that it has been put to good use by all students.

We urge those responsible for the compilation of the curriculum not to consider for one moment the abandonment of such a worthy and profitable innovation.

Earlier we reviewed the general history behind the establishment of the new Department of Animal Husbandry. Before discussing the less desirable features of the change we hasten to reaffirm our general support for the new courses, and to point out that the constructive criticism which we offer is realistic and should be considered in any reorganisation of these courses for 1957.

As Professor Robinson points out in his article the Animal Husbandry course includes the small subjects of Agricultural Botany given to Third Year and Soil Science given to Second Year. We, however, question the assertion that they are small subjects.

The Third Year course in Agricultural Botany has to our own personal experience been responsible for very real ill feeling towards the new Department. The principle of a broad outline knowledge of pastures, their establishment and grazing management plus a certain familiarity with the main pasture species is a good one, and is recognised by most students as such. But the ridiculously long and detailed practical work classes, together with the equally difficult task of assembling a pasture collection (preferably in flower) from June to September soon converted this so-called minor subject into a bugbear consuming more than its worth in time and inconvenience. When one considers the relative importance of Agricultural Botany and such subjects as Veterinary Pathology, Pharmacology, Veterinary Physiology and Veterinary Anatomy II the present situation becomes insufferable.

It appears that for similar reasons Second Year students regard Soil Science with feelings parallel to those of Third Year.

While admitting that any transition period must be beset with growing pains, we are no less certain that this is poor consolation to students facing the examiners this year.

We believe that if these courses are to be continued in Second and Third Years they must be modified and severely pruned. More notice would have to be given of pasture collections and less time devoted to the purer aspects of botanical and soil sciences.

However, the most amazing thing of all, to us, is that despite increases throughout the course the curriculum of First Year remains sacrosanct. This must surely be the greatest anomaly of the whole course.

In Lent Term, First Year has both Tuesday and Thursday mornings and Wednesday afternoon free; in Trinity Term a similar situation exists; and in Michaelmas Term the free time is reduced to two mornings a week. In addition a total of approximately one hundred and eight hours is spent in Botany I practical work alone.

The value of this practical work is, in proportion to the time taken, negligible. Virtually no study of economic plants is made, and the course seems to revolve around an enormous number of obscure algae and fungae. Our point is that the integration of Agricultural Botany into the present course could take place without any additional work for the administrative and academic staff.

First Year students, deprived as they are of contact with the Faculty, would welcome some connection with the rest of the course. They would be far more receptive and interested in the finer botanical points of taxonomy than their more senior comrades-in-arms. In addition, the course in Agricultural Botany could be expanded to take over more of the time allotted to Botany I practical work.

A distinct advantage of removing these courses to First Year is that it will provide students with a yardstick for critical evaluation of pasture and management practises encountered during practical field training. It need hardly be stressed that it is in the vacations from First to Third Year that the majority of students receive practical field experience in Animal Husbandry.

We can see no reason why some of the free time in First Year should not be utilised for the teaching of Soil Science.

Some critics will argue that freshmen students are too immature to undertake these courses. We would regard such an objection as sheer balderdash since the changes envisaged by us are more those of a change in emphasis rather than of an increase in volume.

Many will no doubt say, what of foreign and interstate students. We reply that this is the University of Sydney and of nowhere else and furthermore that the course preceding the degree of Bachelor of Veterinary Science is of five years. Changes in First Year would mean that overseas and interstate students would have to start the course from the beginning.

In conclusion, we must express again the thanks of the Veterinary Student Body to those people who have been instrumental in providing us with some spare time, in the form of free Wednesday afternoons. Again we must stress that the unfavourable reaction in both Second and Third Years to the new courses is simply a matter of degree, and of presentation, and that in general the students welcome the principle behind the new courses. We have placed before the responsible authorities, the opinion widely held by students, that integration of the new courses into First Year will be of great and general advantage, academically and otherwise.

We ask that very serious consideration be given to our proposals.

# SYDNEY UNIVERSITY VETERINARY SOCIETY

### Office Bearers, 1956

**Patrons:** 

Professor R. M. C. Gunn, Professor, H. R. Carne, Professor C. W. Emmens, Sir Ian Clunies-Ross, Dr. H. R. Seddon.

President: I. K. Hotson.

Vice-Presidents: M. B. Harvey, H. G. Pearce, R. B. Marshall. Executive: W. R. Hayward, B. E. Goulden, J. D. Bryden.

Honorary Secretary: E. R. Allen.

Assistant Honorary Secretary: R. G. Hopkirk.

Honorary Treasurer: R. Borland.

Honorary Graduate Secretary: Miss V. E. Osbourne, B.V.Sc.

Honorary Auditor: Mr. R. K. Ryan, B.V.Sc.

Women's Representative: Miss L. Leedham.

**Dance Committee:** 

Miss J. Magnus, Miss H. Jervie, G. H. Trevena, T. O'Shea, G. Lester, R. Grieve.

Dinner Committee: Miss Jenkins, H. van Shaik, G. A. Stewart, P. Ahrens.

Float Committee: R. J. Steel, D. Moore, R. Gordon, G. Hard, R. Wells, I. Joyce.

Debating Committee: H. M. G. Williamson, D. Coleman, R. Wells.

Film Committee: M. B. Harvey, T. McManus, B. Gilbo.

Book Purchasing Officers: V. Green, R. Dixon.

Publicity Officers: W. Leaming, Miss J. Magnus, M. B. Harvey, H. G. Pearce.

Year Representatives:

R. Grieves, I; Miss J. Magnus, II; D. B. Galloway, III; P. Richards, IV; D. Cordes, V.

### PRESIDENT'S LETTER TO MEMBERS

Ladies and Gentlemen,

It has indeed been a privilege and an honour to have occupied the position of President of the Veterinary Society this year, and I do thank you all for conferring such an honour upon me.

The affairs of the Society have been handled this year by an able and efficient Executive Committee, and I extend my sincere thanks to all Executive Members for their help and enthusiasm in Society affairs. I would also like to thank Professor Carne and Professor Gunn for their help and advice, both to myself and to the Executive.

I extend thanks also to the many com-

mittees which have helped to make our social activities so successful this yearto the Dance Committee for the very successful Ball and Informal, and to the Dinner Committee for one of the best Dinners ever; I think this year's Round House Gathering has set the standard for many years to come. A word of thanks, too, for our many Publicity Officers, who kept us informed of current events, and brightened the notice boards with colourful and ingenious posters. A very energetic Film Committee has revived the Friday lunch-hour film programmes, and the work of its members has been very much appreciated.

During the year, certain changes were made in the Constitution of the Society, with the result that the Book Scheme has been brought under closer supervision of the Executive Committee. It is intended that the service provided by the Book Scheme will be improved in several ways. Thanks are due to our very energetic Book Purchasing Officers, whose constant work is sincerely appreciated.

It is hoped that we will be able to inaugurate an Instrument Scheme for Society members, to be conducted on similar lines to those of the Book Scheme. This scheme will save Third and Fourth Year students considerable expense in the purchasing of instruments. The thanks of Fourth Year Students are due to Mr. John Poland, who initiated the scheme this year.

Enthusiasm for Veterinary activities has been very marked in the field of sport this year, and the Sports Club is to be commended for the enthusiasm shown for its many activities. Although only a small Faculty, we have so far fielded teams in Hockey, Swimming, Basketball, Shooting, and Rugby Union, and the enthusiasm shown by players and spectators (students and staff) has been good to see. We look forward to the activities of third term with interest.

The setting aside of Wednesday afternoons free from lectures provided an opportunity this year for the Society to arrange cultural and sporting activities. An interesting and varied programme was arranged, and some excellent speakers addressed the Society meetings. Unfortunately attendances were not good. If the privilege of free Wednesday afternoons is to be retained, it rests with the members of the Society to see that Wednesday activities are fully supported in the future.

Good news was forthcoming earlier this year in the shape of a further large donation to the Common Room Fund. The need for adequate staff and student common rooms has long been recognised within the Veterinary School, and our thanks go to Professor Carne for his work over the past few years in support of this important project. With the Fund as it now stands, we should soon see tangible evidence of our/long-awaited common rooms, and our sincere thanks are due to the very generous donor who has made this possible.

The Common Rooms will provide attractive and comfortable surroundings for personal contacts and informal discussion in leisure time, opportunities for which have been sadly lacking at our School in the past. Much has been said of the select 'Groups" which exist in our School. and of the way these give way to more friendly and co-operative student relationships in later years. . . I feel that a pleasant Common Room, by providing a common meeting place for students of all years, will contribute in no small way to the establishment of the cheerful, friendly and co-operative atmosphere which can and should be one of the most enjoyable parts of our University life.

Several changes are taking place in the syllabus of our course at this time, and among them is the new course in Animal Husbandry, taking the place of the former Zootechny course. Although some may argue that undue emphasis is placed on the subject of Animal Husbandry in our undergraduate training, it must be realised that the Field Veterinarian, working with problems of herd and flock, must have a sound basic knowledge of the principles of livestock husbandry and production if he is to serve the livestock owner to the best of his ability. Briefly, the responsibilities of the Veterinarian are: (i) The eradication of disease; and (ii) the maintenance of production. There is an ever-present and increasing demand for the services of the Veterinarian in an advisory capacity, concerning the problems of livestock production, and in such a capacity, the service which the Veterinarian will be capable of rendering will be largely determined by his knowledge of the principles and practices of Animal Husbandry-be it a question of what breeding methods to adopt, what feeds should be used and how they should be fed, or perhaps what are the best methods of carrying out routine operations with stock.

Of course, we cannot pretend that a knowledge of Animal Husbandry alone will make a good Vet.—there are many other specialised fields of knowledge which the student must cover—but it is well to remember that the subject of Animal Husbandry has a definite place in any plan for the attainment of a comprehensive veterinary education.

The true purpose of all professions may be regarded as the rendering of a valuable service to humanity. In carrying out his major responsibilities of disease eradication, the lessening of suffering in our domestic animals, and the maintenance of livestock production, the Veterinarian has unlimited opportunities for service, be it to the owner of a pet, to an owner of livestock, to the livestock industry, or to the State. Such service comes to be expected of professional men as a matter of course, and if we can all consciously strive to give a little extra service in our work—what might be termed "service plus"—then we will be doing our part to enhance the fine name and reputation of a splendid profession.

I wish you all every success in the service of Veterinary Science in the years to come.

Yours sincerely,

IAN K. HOTSON, President, S.U.V.S.

### **PRIZES**, 1955

John Gurner and Frederick Ebsworth Prize: Peter Charles Taylor. Baker and Ridley Memorial Prize: William Peter Clifford Richards. A.V.A. Prize for Undergraduates in Veterinary Pathology: William Peter Clifford Richards.

William Cooper and Nephews' Prize: Thomas David Quinlivan. S. T. D. Symons Prize for Clinical Subjects: Roderick Kennedy Ryan. J. D. Stewart Essay Prize: David Denning Smith.

Farr Memorial Prize for Equitation: David Bruce Galloway.

# **VETERINARY SCHOOL COMMON ROOMS**

It was reported in the last issue of "Centaur" that the University had received a substantial gift for the purpose of establishing common rooms in the Veterinary School and that an architect had been appointed to prepare draft plans.

It was considered that the most suitable site for the common rooms was on the northern side of the main building adjacent to the museum.

Unfortunately, it was found that with present high building costs, the funds available were inadequate for the object in view. Rather than proceed with plans which would fall far short of the objective, it was decided to seek for further funds. A second substantial sum has now been given by the same anonymous donor which it is hoped will be sufficient to carry plans to completion.

The University Senate has given its general approval to the architect's sketch plans which comprise a two-storey building extending towards Parramatta Road from the main Veterinary Science building. This will provide for a Junior Common Room on ground floor level with entrance

through the present museum, and opening onto a small paved courtyard which will be included between the new building and the new wing of the McMaster Laboratory. The Senior Common Room will be at firstfloor level.

It is anticipated that the architects will prepare detailed working drawings in the near future. Consideration is being given to the practicability of providing light refreshment services which would add considerably to the attractions of such common rooms.

### Who Said That?

There are two reasons for drinking: One is when you are thirsty, to cure it; the other, when you are not thirsty, to prevent it . . . prevention is better than cure.

\* \* \*

A Frenchman remarked: "You are funny, you English. You take strong whisky; you put water in it to make it weak, you put sugar in it to make it sweet, you put lemon in it to make it sour, then you say 'Here's to you,' and drink it yourself."

# ANNUAL REPORT OF SYDNEY UNIVERSITY VETERINARY SOCIETY, 1956

Ladies and Gentlemen,

I have much pleasure in presenting the 44th Annual Report of the Sydney University Veterinary Society.

Roll numbers have increased by a total of 15 this year to 184 and I am pleased to report that we have 100 per cent. membership of the Society.

The Society's social functions proved very popular again this year.

The Informal held at the University Union was very well attended. We were, however, disappointed by the small representations from the junior years.

The Annual Ball again held at the Union was a great success. We were pleased to welcome quite a number of graduates and members of the staff.

On behalf of the Executive I wish to thank all members of the Dance Committee for the excellent job they did in making both these functions the successes they were.

Cahill's Restaurant was once more the venue of the Society's Annual Dinner, which was held as usual during the last week of Lent Term. The excellent attendance of 112 was most gratifying and was not the least factor in making the evening such an enjoyable one. Following the formal proceedings a large group retired to the Round House to carry on the old traditions.

The Executive extends its thanks to the Dinner Committee for a good job very well done.

An innovation in the field of Veterinary School social functions, which proved to be one of the highlights of the year, was a most excellent barbeque organised by members of Final Year and held at the McGarvie Smith Farm.

The Book Scheme has undergone considerable review by the Executive during the year with the result that a new scheme of operation will commence towards the end of this year. With the support of Society members a more prompt and efficient service should be rendered.

The formation of an Instrument Scheme is at present being investigated. A cily instrument firm is prepared to grant the Society a considerable discount on the bulk purchase of instruments. This discount is well above the normal 10 per cent. granted to student purchasers.

Our thanks are extended to Mr. Poland for the valuable time he has spent looking into this matter.

The Wednesday afternoon activities of the Society have not proved the great success that it was hoped they would at the commencement of the year. As well as sporting activities we have had some most interesting addresses and films but on the whole the attendances have been very poor.

The Executive wishes to congratulate the Film Committee on the regularity and high standard of its programmes throughout the year.

We also wish to extend our thanks to Professor Gunn and Professor Carne for the assistance they have so willingly given us during the course of the year.

I would personally like to thank Mrs. Joy Pearce for the assistance she has given by typing our correspondence.

> E. R. ALLEN, Hon. Secretary.

News Item.—10% cut in lectures, but same amount of work!

If this mistake

Is allowed to partake

Of a 10% cut in our sleep,

Will a similar break

Of the 10% make

Be added in exams—say on sheep?

\* \* \*

Can a professor

Be a possessor

Of that peculiar Veterinary touch,

Or must he be a confessor

To just being assessor

For Ag. Botany, Breeding and such! And they say to the masses

There won't be any classes

But a Wednesday afternoon snooze, But don't fill your glasses

Or make any passes,

For culture doesn't mean booze.

## ANIMAL HUSBANDRY IN THE VETERINARY CURRICULUM By Professor T. J. Robinson.

Animal Husbandry is the Science of the Economical Management of the Domesticated Animals. As such its scope is extremely wide and its students require a sound training in general science as well as in the fields of :—

- 1. Disease prevention and control.
- 2. Animal management, handling, housing, and day-to-day care.
- 3. Animal physiology and biochemistry, involving a clear understanding of the physiological and biochemical processes involved in normal functioning of the animal, with particular reference to reproduction, adaptation to environment, and all production processes.
- 4. Animal nutrition.
- 5. Animal genetics, and breeding plans and policies.
- 6. The animal in relation to general agricultural and pastoral pursuits.
- 7. Pasture establishment, improvement and maintenance.
- 8. Rural economies.
- 9. The nature of animal products and their technology.
- 10. Animal production—the application of science in practice.

It has been recognised for many, many years that the existing course in Veterinary Science did not adequately cover all these topics. This recognition has led to the establishment of the Department of Animal Husbandry which, with the acquisition of the two Animal Husbandry Farms, "Corstorphine" and "May Farm, at Cobbitty, promises to place the Faculty of Veterinary Science in a very strong position in the teaching of Animal Husbandry. The farms, which total some 800 acres, are to be the University centre for teaching and research in this subject and in Clinical Studies. They are now being developed and improved by Mr. H. J. Geddes, the Director of Animal Husbandry Farms. The building of student and staff accommodation and of lecturing and library facilities will commence this year (1956), and final year students will go into residence in 1958. In that year they will receive advanced training in Animal Husbandry and in Clinical Studies while

in residence.

The course as a whole has been modified so that about 15 per cent. of the Second to Fifth Years, inclusive, is devoted to Animal Husbandry. Because of the wide diversity of topics involved, a number of small subjects such as Rural Economics, Soil Science, Wool Classing and the like are taken, and are bulked to provide three major courses of study, namely Animal Husbandry I, II and III, taken respectively in the Second, Third and Fifth Years of the course.

Animal Husbandry I includes four subjects, namely Animal Management, Rural Economics, Soil Science and Wool Classing.

Animal Husbandry II includes three subjects, namely Animal Breeding, Principles of Nutrition and Agricultural Botany.

Animal Husbandry III, to be taken at Cobbitty, consists of two parts. Part 1 is a detailed course in Applied Nutrition and Animal Production, while Part 2 is a highly advanced course in various aspects of the physiology of the domestic animals. Specialist lectures will be drawn from the University, C.S.I.R.O. and other sources.

Problems of an Animal Husbandry nature are constantly encountered by the Veterinarian. Also some graduates may wish to enter some branch of their profession in which the major emphasis is on Animal Husbandry, or they may wish to pursue a research or teaching career. The courses of study which have been included in the new Veterinary curriculum will give students a sound background to deal with husbandry problems encountered in general practice or for post-graduate specialisation in this important branch of rural science.

One man to another: They call my girl friend Claustrophobia; she lives in constant fear of confinement.

She disliked hearing about her husband's heir-raising adventures in foreign lands.

A diplomat is one who can put his foot down without stepping on somebody's toes.

# **MEMBERS OF STAFF OF THE VETERINARY** SCHOOL

### **UNIVERSITY OF SYDNEY. 1956**

#### DEPARTMENT OF VETERINARY SCIENCE

Professor R. M. C. Gunn, D.V.Sc., B.Sc.Agri., F.R.C.V.S., B.Sc. (Edin.), (Dean of the Faculty).

Mr. R. M. Webb, B.V.Sc., Senior Lecturer in Veterinary Anatomy. Miss V. E. Osborne, B.V.Sc., Lecturer in Veterinary Anatomy. Mr. C. S. Sapsford, B.V.Sc., Lecturer in Veterinary Anatomy.

Mr. L. H. Larsen, B.V.Sc., M.S. (Colorado), Senior Lecturer in Veterinary Surgery, Obstetrics and Gynaecology. Mr. A. K. Lascelles, B.V.Sc., Lecturer in Veterinary Surgery.

Mr. V. E. H. Davis, B.V.Sc., Part-time Demonstrator in Clinical Methods.

- Mr. E. N. Larkin, B.V.Sc., Part-time Demonstrator in Clinical Methods.
- Mr. K. E. W. Robinson, M.A. (N.Z.), Part-time Lecturer in Livestock Geography.

#### Secretarial

Mrs. S. D. Lewis.

### ical and Attendant

I Cumiçai anu Attendant				
Mr. C. Rames.	Mr. A. Webb.	Mrs.	C.	Mason.
Mr. J. R. Hadden.	Mr. F. Seller.	Mrs.	Ε.	Jones.
Mr. V. Slavin.	Mr. S. T. James.			

### DEPARTMENT OF VETERINARY PATHOLOGY AND BACTERIOLOGY

Professor H. R. Carne, D.V.Sc.

Miss P. McGarrity.

- Mr. R. V. S. Bain, B.V.Sc., Senior Lecturer in Veterinary Pathology and Bacteriology.
- Mr. J. H. Whittem, B.V.Sc., Lecturer in Veterinary Pathology and Bacteriology.
- Mr. K. G. Johnston, B.V.Sc., Lecturer in Veterinary Pathology and Bacteriology.
- Mr. A. D. Donald, B.V.Sc., Teaching Fellow in Veterinary Pathology and Bacteriology.
- Mr. R. D. Barrry, B.V.Sc., Teaching Fellow in Veterinary Pathology and Bacteriology.
- Mr. H. McL. Gordon, B.V.Sc., Part-time Lecturer in Veterinary Parasitology.
- Mr. J. Drabble, B.V.Sc., Part-time Lecturer in Meat Inspection.
- Mr. I. Sommerville, Part-time Demonstrator in Veterinary Parasitology.
- Mr. M. A. Gemmell, B.V.Sc., George Aitken Pastoral Research Fellow in Parasitology.
- Dr. K. V. Jubb, B.V.Sc., M.S. (Cornell). Ph.D., Temporary Lecturer in Veterinary Pathology and Bacteriology.

Secretarial

Miss P. K. Warre		Mrs. D. Robertson, B.A.		
Technical and Attendant				
Mr. L. E. Whitlock.	Mr. G. Page.	Mr. W. Kraus.		
Mr. R. F. Jones.	Mr. G. Bow.	Mr. A. Murdoch.		
Mr. A. R. Thorne.	Miss K. Davern.	Mrs. E. A. McMahon		
Mr. N. F. Jones.		Mrs. H. Ryde.		
Mr. E. Lepherd.		Mrs. B. Ferris.		

### DEPARTMENT OF VETERINARY PHYSIOLOGY

Professor C. W. Emmens. D.Sc., Ph.D.

Dr. I. G. White, Ph.D., Lecturer in Veterinary Physiology.

- Mr. A. W. Blackshaw, B.V.Sc., Research Fellow in Veterinary Physiology.
- Dr. P. J. Claringbold, B.V.Sc., Ph.D., Senior Lecturer in Veterinary Physiology.
- Mr. A. H. Brook, B.V.Sc., Part-time Demonstrator in Veterinary Physiology.
- Mr. L. Martin, B.Sc., Research Assistant, N.S.W. State Cancer Council.

Mr. I. Martin, B.V.Sc., Field Research Officer, Milk Board.

Mr. D. R. Lamond, B.V.Sc., Research Student.

Dr. J. Rendel, B.Sc., Ph.D. (Lond.), C.S.I.R.O. Animal Genetics Section.

Dr. A. Fraser, B.Sc., M.Sc., Ph.D., C.S.I.R.O. Animal Genetics Section. Dr. W. Scobie, Ph.D., B.Agri.Sc., C.S.I.R.O. Animal Genetics Section.

Dr. G. H. Humphrey, M.Sc., Ph.D., Lecturer in Biochemistry.

Secretarial: Miss E. Dver. Technical and Attendant

Iechnical and Attendant					
Mr. A. A. Audet.	Miss A. Tamblyn.	Miss N. Yaldwyn.			
Mr. R. M. Penn.	Miss J. Palesy.	Miss Y. Coupe.			
Mr. N. Sinclair.	Miss D. Gabriel.	Mrs. F. Van Bossum			
Mr. J. Tye.	Miss H. D'Arcy.	Mrs. Forster,			
Miss L. Kerr.		Mrs. Gilmore.			

### DEPARTMENT OF ANIMAL HUSBANDRY Full Time

Professor T. J. Robinson, Ph.D., M.Sc. (Agric.), Professor of Animal Husbandry.

- Mr. H. J. Geddes, M.Sc. (Agric.), Director of Animal Husbandry Farms and Garland, Senior Lecturer in Animal Husbandry.
- Dr. H. G. Belschner, D.V.Sc., Senior Lecturer in Animal Management Mr. R. K. Ryan, B.V.Sc. (Hons.), Lecturer in Animal Management.

Mr. J. S. F. Barker, B.Agr.Sc. (Hons.), Lecturer in Animal Genetics.

Part Time

- Dr. M. C. Franklin, Ph.D., M.Sc., William McIlrath Fellow in Animal Husbandry, C.S.I.R.O., McMaster Laboratory, University of Sydney.
- Dr. R. L. Reid, Ph.D., B.Sc.Agr., Principal Research Officer, C.S.I.R.O., Sheep Biology Laboratory, Prospect.

Secretarial: Miss E. Morton.

### DEPARTMENT OF VETERINARY MEDICINE

Mr. D. C. Blood, B.V.Sc., Senior Lecturer in Veterinary Medicine.

Mr. J. D. Steel, B.V.Sc., Senior Lecturer in Veterinary Medicine.

- Mr. T. G. Hungerford, B.V.Sc., Part-time Lecturer in Diseases of Poultry.
- Dr. H. G. Belschner, D.V.Sc., Part-time Lecturer in Diseases of Sheep.
- Mr. N. K. Golding, B.V.Sc., Part-time Lecturer in Veterinary Jurisprudence.
- Dr. H. R. Seddon, D.V.Sc., Part-time Lecturer in Epidemiology.
- Mr. L. A. Monk, B.V.Sc., Part-time Teaching Fellow in Veterinary Materia Medica, Therapeutics and Pharmacy.
- Professor R. H. Thorpe, B.Sc., Ph.D. (Med.), Part-time Lecturer in Veterinary Pharmacology.

Technical: Mr. R. Paris.

### UNIVERSITY VETERINARY HOSPITAL AND CLINIC

Mr. J. M. Keep, B.V.Sc., Superintendent.

Miss A. Bogdanovic, B.V.Sc., Junior House Surgeon. Miss D. P. Edmondstone, B.V.Sc., Junior House Surgeon.

Attendant

#### Mr. G. M. Hannan. Mr. K. M. Griggs. McGARVIE SMITH ANIMAL HUSBANDRY FARM

Mr. H. J. Geddes, M.Sc.Agr. (N.Z.), Senior Lecturer in Animal Husbandry and Director of University Farms.

Mr. D. C. Blood, B.V.Sc., Senior Lecturer in Veterinary Medicine. Mr. D. R. Hutchins, B.V.Sc., Clinical Officer.

Miss M. James.

Mr. R. H. J. Hyne, B.V.Sc., Junior House Surgeon.

Secretarial

Miss N. Jagelman.

Mrs. Richards (Housekeeper).

### Technical

Mr. K. Kerr, Laboratory Assistant. Miss E. Nobbs, Junior Technician.

#### Attendant

Mr. T. M. Black, Overseer.

Mr. F. Fishwick, Dairy Hand. Mr. C. Cooper, Dairy Hand.

Mrs. M. Peers, Dairy Hand.

Mr. V. Milne, Animal Attendant.

"Corstorphine"

Mr. J. M. Hunt, Leading Hand.

Mr. B. A. W. Hempel,

Dairy Hand.

Mr. W. Stesanczyk,

Dairy Hand.

Mrs. A. Stesanczyk,

Dairy Hand.

Mr. M. R. Roberson,

Leading Hand.

Mr. K. Cizymala, Dairy Hand.

Mrs. H. Cizymala, Dairy Hand.

"May Farm"

# CHANGES TO STAFF, 1956

### RESIGNATIONS

Mr. J. A. Springhall, who had been acting as Lecturer in Zootechny, resigned at the end of 1955, and is now working with Drugs Houses of Australia Ltd.

Dr. G. F. Finlay retired at the end of 1955 from his position as Teaching Fellow in Animal Genetics.

Mr. D. S. Roberts is now working at the Animal Health and Nutrition Laboratory, Nedlands, Perth. During 1954 and 1955 he was Teaching Fellow in Veterinary Pathology and Bacteriology.

Miss J. Caterson left the Veterinary Hospital, where she was employed as Junior House Surgeon during 1955, at the end of the year and is now working with Mr. John Anderson, of Guildford.

Mr. J. D. Dunsmore, the first Junior House Surgeon at the University Farm Clinic, left at the end of 1955 and is now working in New Zealand.

### **APPOINTMENTS**

Professor T. J. Robinson commenced duties as Professor of Animal Husbandry

in February, 1956. Dr. H. G. Belschner, who retired from his position as Chief of the Division of Animal Industry in the Department of Agriculture, has been acting as Temporary Lecturer in Animal Husbandry this year, as well as giving lectures on Sheep Diseases to Fifth Year students.

Mr. R. K. Ryan, B.V.Sc., has been appointed Lecturer in Animal Husbandry. He commenced his course in 1951 and graduated in January, 1956. He was President of the Sydney University Veterinary Society in 1954.

Mr. A. D. Donald, B.V.Sc., who graduated in January, 1956, has been appointed Teaching Fellow in Veterinary Pathology and Bacteriology. He commenced his course in 1951 and acted as Honorary

Mr. D. Bray, Dairy Hand. Mr. P. Richards, Dairy Hand. Secretary of the Sydney University Veterinary Society in 1954.

Miss A. Bogdanovic, B.V.Sc.., has been appointed Junior House Surgeon in the Sydney University Veterinary Hospital. She did the earlier part of her course at Hanover University and commenced at Sydney University in 1952, graduating in January, 1956.

Mr. R. H. J. Hyne, B.V.Sc., has been appointed Junior House Surgeon at the University Farm Clinic. He commenced his course in 1950 and graduated in January, 1956.

Miss E. Morton has been appointed Secretary to Professor T. J. Robinson.

LEAVE

**Mr. C. S. Sapsford** left for England on 8th August, where he will work for twelve months under Professor Amoroso of the Royal Veterinary College, London.

### **BOOK SCHEME REPORT**

For those who don't know it, the Veterinary Society runs—with a huge debt—a Book Scheme, which will order and purchase for you all the text books that you need, and the odd few that you don't.

Not only will we do this, but there is also a discount ranging from 10-20 per cent. on all purchases. All you have to do is to place your order with your Year Representative, or come and see us with a deposit of 5/- for each book and we will do the rest. If, through an Act of God or the Professional Board, or if we find books are going to arrive very late, "your money will be cheerfully refunded."

Due to printers' strikes, wharf strikes and a large number of new editions, the system rather broke down this year with books arriving late; now there has been a Meeting of the Minds, and this delay, we hope, will not occur again.

This scheme depends on you, both for support and for cash, and upon these two, depend our scope of operations and bankruptcy; so please, cash, cheque, or dancing girl when you collect the books.

R.T.D. and V.G.

The only female who can tell everything she has in her bag without looking is a lady kangaroo.

### FLOAT COMMITTEE REPORT

The Faculty Float this year was a belated effort to try and impress the masses with the erroneous belief that horse racing and its adherents are truly sporting.

A horse was constructed from a Teachers' College (re) vaulting horse for body to which was attached a large tail, fleshless head and neck, and the usual distinguishing accessories indicative of gender.

Such an animal was undoubtedly a much more comfortable mount for some of our members and the mobile articles they handled later at Badgery Creek.

Suitable riding equipment was attached plus a large and prominent car battery behind the saddle. This appeared to produce a greater stimulating effect on the female jockey who spent most of her ride in verbal conflict with the crowd.

An active bookie deluged excited punters with forged £5 notes. A dour individual cracked a whip at intervals but ceased when it became apparent that a possible tram hold up was likely.

"Hangover" by "Night Out" out of Gay Deception"—as the horse was labelled —did not impress his supporters much when he was challenged to a match race down Broadway by "Pegasus"—an "Oval" draught horse, ridden by two over weight female jockeys.

Some excitement ensued on Parramatta Road when a footsore female collector was hauled aboard by a lusty groom. It was a commendable gesture on the part of the latter but the unfortunate rigidity of a metallic projection on the truck's tray rather unfurled a tightly bound skirt and deprived its owner of her prideful place as a male equal until hasty repairs could be carried out.

### WOMEN'S NOTES, 1956

At the present time our numbers are pathetically few—fourteen women in all.

Fortunately, there are seven women in First Year otherwise we would not have been able to field any sports teams.

Margot, our sports representative, organised and participated wholeheartedly in the interfaculty events as well as providing a floor show at the ball.

In Second Year we have our very able and energetic Judy Magnus, not forgetting "Jiving" Jervie.

Judy has done a good job in organising our social functions and is keenly interested in Faculty affairs.

Alas, in Third Year, there are no women!

In Fourth Year, we find, too, an insufficient number to exert any restraining influence on students or staff who behave as if we were not present at times.

The motto of the Fifth Year women seems to be "Go north, young woman." Del has just returned from Yerrongpilly —Russ from the Gulf Country. Ann seems to favour home grounds in the south.

The women graduates are doing their share as house surgeons for two successive years. The house surgeons, however, seem to have a strange predilection for Fifth Year students.

Finally, we wish all the women the best of luck in the coming exams.

L.N.L.

# FILM SOCIETY REPORT

This year the Committee decided that a little less apathy and a little more active work would be better appreciated by all and sundry. As a result, lunch-hour programmes were arranged for every Friday and these commenced in the fourth week of first term.

To overcome the time consuming worry of having to chase after films every week, a detailed schedule was compiled for the whole year including several proposed Wednesday afternoon shows. This rather difficult task was accomplished by referring to the catalogue of the Film Users' Association of Australia in which is listed some fifteen thousand, sixteen millimetre films. All the likely suitable ones were selected and, with the aid of the various film libraries, balanced hourly programmes were drawn up and reservations made right up until November.

However, in spite of its efforts to please, the Film Committee received little thanks and a fair amount of criticism from some of the audience members. A brief attempt will be made here to discuss two or three of the several points raised, mainly for the benefit of future committees.

The most frequent enquiry was: "Why are not more Veterinary and Agricultural films shown?" Apart from the fact that most students received more than their fill of these during the course, it must also be remembered that at least half the audience consisted of McMaster and Veterinary Physiology employees most of whom could scarcely be asked to endure a battery of rather dry Veterinary topics week after week.

Another common criticism was that many of the subjects contained too much propaganda. This was quite true in some cases and wherever possible the problem was avoided when initially selecting programmes. Nevertheless all the features were documentaries and a certain amount of tourist attraction, etc., propaganda is to be expected. The only method of coping with this was to keep it as limited as possible so that it didn't interfere with audience reaction. In most instances this was achieved successfully.

Several other queries were brought forward on one of which a final comment can be made. "Can't we have some 'Donald Ducks' and Mickey Mouses'?" This question was asked time and again and the reply is a straightforward one. To hire cartoons and feature films is a very costly business and without large audiences and/or a considerable admission charge per head, they could only be put on at a dead loss. Somebody would have to bear the brunt of this and the Veterinary Society could scarcely be asked to do so. Incidentally, all the films that were shown during the year were provided free of charge.

In conclusion, the Veterinary Film Committee would like to thank the National Film Board of Canada, the Rural Bank, the United States Foreign Office, the N.S.W. Film Council and the United Kingdom Information Service for their help in providing films and in the compilation of programme lists. Also to the University attendants who managed unfailingly to provide projectors throughout the year, sincere appreciation is expressed.

Good documentary films are not only entertaining and instructive, but they also broaden one's outlook on the world and its people, and who will deny that this is a most useful asset for any University student especially in these modern times.

W. B. Gilbo, B. Harvey, T. J. McManus.

### THE UNION

### HOUSE COMMITTEE

The actual function of the House Committee is probably unknown to most Veterinary Society members. The House Committee consists of the President and Vice-President of the Union, a Senate Representative (Mr. Webb), one member from each Faculty and an Evening Students' Representative. It controls the internal administration of the Unionfood, hire of rooms, games, sale of goods, etc., and common rooms, reading rooms, periodicals, etc. In addition, it furnishes such outposts as the University Farm and Law School Common Rooms as well as supplying periodicals and papers to these places and various Hospital Common Rooms.

It deals with suggestions from members (placed in a suggestion book obtainable in the exchange) as well as suggestions from members of the House Committee. The House Committee wants to know of any dissatisfaction by members and will do its best to correct this.

A sum of £5 has been allocated for the year ending 1st September, 1957, for purchase of periodicals by students in residence at Badgery's Creek.

I would be glad if members of the Society with ideas for improvement of service or facilities at the Union would bring them to my notice.

JOHN BRYDEN.

# DANCE COMMITTEE REPORT

\_\_\_\_\_

The Informal was held at the Union on Friday, 20th April—and with an attendance of 181 was socially, if not financially a success. Once again, we had Ellwood Bowen providing the music, and in spite of Mr. Baggy it. al—they were very loathe to stop at the appointed time. Fortunately the Union woodwork and paintings withstood the door-top high kicking displays —or our balance sheet would have been in a sad state. Unfortunately, the delightfully tuneless renditions of various songs were cut short by the stewards, who feared for the microphone.

The Formal made up for the loss incurred with the Informal—and showed a

slight profit as well. It also was held at the Union on Friday, 29th June—and again we hired Ellwood to play for the 207 who attended.

We regretted the absence of Dr. and Mrs. Gunn and the fact that no Official Guests were able to be present—and thank Mr. and Mrs. Webb for standing in at the Official table.

Owing to the recent ban on green stuff and various other decorations, we enlisted the aid of some artistic members of First and Second Year to provide posters, and borrowed some large model cows from the Milk Board, which together with our streamers and balloons conformed to regulations—and greatly improved the look of the Refectory. We used berries and white horses for the Official table and our thanks for borrowed wool and bones which we used for decorations. The Anthony Hordern's kid is looking somewhat the worse for wear after its annual trips to the Ball over the past few years.

Mr. Gordon and Mr. Blood judged the Champion female—the award going to Miss Helen Bryden (keeping it in the family), who was presented with the sash and perfume, and passed under an archway of bones.

We endeavoured to overcome the much bemoaned dearth of talent in the Faculty in regard to floor shows with a slightly disorganised effort—which we hope will be a start towards bigger and better shows in future. An impromptu show at the end of proceedings was a valiant marathon effort, much appreciated by all.

Although much criticism of the Union and its suppers is made by many students, no constructive ideas are forthcoming in regard to other sites for our dances. Also, much less leeway is made by other places for typical vet. dance rowdiness, even though their suppers may be more edible.

The Committee thanks those members of Staff, Executive and students who helped in the organisation and success of our two dances.

J.M., H.J., T.O., G.T., G.L., R.G.

George had charge of the entertainment during the past year. His birth provoking antics were always the life of the party, and he will be greatly missed.

### DINNER COMMITTEE REPORT

The Annual Dinner this year was held at Cahills, Castlereagh Street, and the Roundhouse, on the 15th May, and by all accounts was the most successful dinner to date.

The Guest Speaker was the New Zealand Trade Commissioner, who told us, among other things, of the marvellous primary industries of New Zealand, and was frequently questioned by the more discerning members present.

The dinner itself consisted of four courses, the main dish being Porterhouse steak, with finger chips, peas and grilled tomato, though some people said they saw some steak which looked more like chuck steak than Porterhouse.

Perhaps the best and most successful part of the dinner was the sessoin in the Roundhouse which followed and full marks to Hank van Shaik who organised it. Next year, however, we are going to see that there are no ditches dug near the Roundhouse.

These dinners are advocated by "Those Who Know" as being the best place to meet Members of Staff and other students on an equal footing. Unfortunately, due to prior engagements such as births, marriages, etc., many members of the Staff were missing and missed, but there was also a marked absence of students. In fact, there were 115 guests, while we have about 200 students alone.

Now this year, we managed to lose only £22, but if we don't get more First and Second Year students along, there is some danger of the present high standard degenerating through poor attendance.

As stated before, this is one of the best chances you'll have of meeting other students and Staff, so why not come along next year and hear the stories first hand. R.T.D.

# "BARBAGROG"

On Saturday, 7th July, a Barbeque, given by Final Year, was held at the Veterinary Farm at Badgeries Creek.

It was obvious, on arrival, that much work and preparation had been given to the event and an enjoyable time was ensured to all of the quite large (but unrepresentative) number from the Faculty and visitors who attended.

Steaks were cooked over open fires burning in the "court yard" and the spread prepared in the dining hall was indeed a sight for sore eyes of college food (?) eaters.

Many tongues were hanging out after it was discovered that certain Aussie Rules members of the Faculty were still "on the road" with a most valuable cargo aboard. However, the Fifth Year boys did not fail to recognise the symptoms of dehydration and ample beer was obtained from a nearby hostelery.

A programme of music previously prepared was run off the tape by the most capable electrician, "The Lord"; and this passed all previous standards of tranquility and sobriety. An excellent selection of novelty dances took the fancy of even the most orthodox of ballroom dapcers but an item by the "Four Aces" was received with such applause that a live encore was demanded.

After supper all and sundry retired to the "smoking room" where, accompanied by many tubes, we sang to the mellow chords of Ray Ropiha's guitar. This, for some, ended a very pleasant barbeque. Others (not to mention names) regarded the rows of bottle tops with still hungry eyes. It was decided by one of the more agile members of Fifth Year that a little more nourishment would not go amiss, so with utmost stealth the larder was relieved of several pounds of sausages. These cooked over the open fires, dripping with tomato sauce and covered in ash, swallowed and washed down with beer had the most satisfying effects on the constitution.

If a barbeque similar to this were made an annual event, with good support from all years it would become yet another successful annual Veterinary function.

The thanks of all members of the Faculty are extended to all those who worked to make it such a success.

A working girl is one who quit her job to get married.

# THE WAR MEMORIAL ESSAY PRIZE

The conditions of award of this prize as set out in "Centaur," 1953, are as follows:—

- (1) The prize shall take the form of a book of Veterinary interest, and shall be awarded to a student member of the Society for the best original contribution to "Centaur."
- (2) The judges shall be the Dean of the Faculty of Veterinary Science, the

Veterinary Society, and the Editor of "Centaur," and their decision shall be known by the Editor before the publication of "Centaur." (3) The prize shall be suitably inscribed,

President of the Sydney University

(3) The prize shall be suitably inscribed, and shall be presented to the prize winner at a general meeting of the Society before the end of Michaelmas Term each year.

## THE IMPROVEMENT OF THE AUSTRALIAN STOCK HORSE

### INTRODUCTION

Five years ago the introduction of the water-cooled, two-stroke motor cycle to some pastoral properties was hailed as presaging the eventual extinction of the Australian stock horse. Subsequent experience has shown that the areas where replacement of the horse is economically possible are strictly limited, and the recent wet, muddy conditions have emphasised the need for the retention of stock horses even on those properties where mechanised flock management is normal practice. It is certain that the sheep station hack is in no danger of extinction, or even of very great reduction in present numbers. Even in a country such as the U.S.A. where almost complete mechanisation of agriculture exists, the position of the stock horse in the cattle industry remains unchallenged.

The English Thoroughbred has always been the traditional "grader-up" of the native Australian horse population. In the years before Federation the Thoroughbred was raced over long distances on rough tracks, a great proportion of the events being hunts and steeplechases. Most of these horses were worked during the week. In the later days of the colony and subsequently, the introduction of shorter sprint races led to the breeding of a speedier horse which lacked its forebear's qualities of stamina and endurance. Though fast losing the qualities sought after, the use of Thoroughbred sires continued to influence the development of the native horse population. As a consequence of this, degeneration of many of the essential qualities of the stock horse became widespread.

This problem was recognised as early as 1898 by Sir James Peun-Bouquet who established an Arab stud of Brabbet Park stock in that year. Improvement of the native horse population has been behind later Arab importations and more recently of the American Quarter horse.

THE IDEAL STOCK HORSE

The essential requirement of a good stock horse is the ability and love to work stock, together with sufficient stamina to stand long days of hard toil. Though largely of an individual nature, there is evidence that the natural desire to work stock, so characteristic of a good stock horse, is inherited. The "Radium" line, popular in the Northern Rivers and New England beef raising districts shows a very marked inherited capacity for stock work. Improvement of this character can take place from within the present working population. However, it seems that the infusion of increased stamina and endurance into the Australian stock horse must come from without.

Stock horses should be able to turn very quickly, very sharply, and very frequently; they should be able to spring off after a beast and be very fast over a short distance. Translating their requirements into points of conformation we have a heavily built horse of about 15 hands as our ideal He has comparitively short legs, tvpe. short, upright pasterns and small, high, well-shaped feet. His mouth is good, his eyes and ears alert and sharp; his neck is short and massive. Since he must carry a heavy saddle and turn very quickly high withers are desirable. His back is short and broad, his chest large and roomy. His hindquarters are heavy and massive to give quick, fast take-off. His hind limbs should show a short pastern and sound feet. Working horses with long, sloping pasterns and flat feet are very prone to lameness. The widespread tendency to long pasterns and flat feet among the native horses can be attributed to the indiscriminate use of unsuitable Thoroughbred sires over the years. Colour, markings, and other finer points of conformation are of no consequence in breeding stock horses.

Those points of conformation which are discussed above are directly related to stamina, endurance, and the other qualities of the ideal horse. The question arises: "How are we going to incorporate these qualities into our working horses?"

#### IMPROVEMENT

Improvement will take place by the use of pure breeds on the native mares. Only three breeds need be considered, viz., the English Thoroughbred, the Arab, and the American Quarter Horse.

**English Thoroughbred:** The indiscriminate use of the racing Thoroughbred type introduced poor, flat feet, long, sloping pasterns, unwanted height, poor stamina at low paces and other undesirable features to Australian horses. However, to the credit of the Thoroughbred are immense speed, and great muscular development. The judicious use of smaller, more suitable types may in some cases be advantageous; however, generally speaking, this breed is no longer suitable as an improver of the native stock.

The Arab: The qualities of endurance and stamina possessed by the Arab are legendary, and since the early days of the settlement, the few examples of the breed here have been highly prized. In "Robbery Under Arms," by Rolf Boldenwood, published in 1889, "Rainbow," the fabulous horse of the bushranger Starlight, is described as being "more than half Arab." A. B. "Banjo" Patterson, writing of an earlier period in "The First Surveyor," described a stockman's battle through drought, when:—

"His horses died—just one pulled through with nothing much to spare;

God bless the beast that brought him home, the old white Arab mare."

Unfortunately it has only been in comparitively recent times that good quality

Arab stock have been freely available at reasonable prices. To the credit of this breed go great stamina, a good turn of speed, excellent legs, and good, sound feet. On the debit side are tendencies towards droopy rumps and very nervous temperaments.

American Quarter Horse: At present there are only a few stallions of this breed in Australia and little information on the performance of their progeny in this country is as yet available. The breed stands apart from the Arab and Thoroughbred in that it was evolved primarily as a stock horse. Probably Arab and Thoroughbred blood contributed to the formation of the breed. Bred in the Gulf Country and South-west of the U.S.A. the foundation stock were working horses which were raced at weekends over quarter-mile courses at rural race meetings and rodeos. This is primarily responsible for the short, snappy bursts of speed which when considered with its other characteristics make the animal an excellent stock horse type. In conformation the Quarter Horse approaches the ideal, being particularly well developed in the hindquarters. Selection for stock working ability is said to have made this breed naturally keen on working cattle, and very easy to educate in this direction.

#### CONCLUSION

The stock horse is firmly established in the Australian pastoral industry as an economic animal of considerable import-Unfortunately little improvement ance. has taken place in the standard of the native horses over the past eighty years and generally speaking their quality has declined. Improvement of the Australian stock horse will bring in its train economic advantages to the pastoral industry. The widespread use of unsuitable Thoroughbred stallions has been mainly responsible for the decline in quality and improvement cannot take place until this practice is discontinued.

The use of quiet Arab strains on the native mares will help to eliminate many of their undesirable Thoroughbred characteristics, and will give new vigour and stamina to the crossbred progeny. If the American Quarter Horse proves suitable for Australian conditions, and present indications are that it will, its widespread use would improve our horses immensely. Selection for natural stock working ability must proceed hand in hand with the improvements in stamina and conformation which will arise from the use of Arab and Quarter Horse sires on the native mares. G. D. C. COLEMAN,

Third Year.

### THE STOCKMAN AND HIS DOG

Men have different ideas about the relationship that should exist between them and their dogs.

Some can never look upon their dogs as friends or treat them with anything but the bare kindliness that is due to all animate things. For themselves the dogs do not expect more. They regard themselves as pieces of station machinery and are content to eat and sleep and to trot with dull tenacity behind the stockmen. Patient, industrious little brutes they are, who work hard when called upon to tail up lagging stock; but dogs without personality.

But some dogs are different; plainly having a soul and being capable of the finer shades of feeling.

There are qualities in the cattle dog that make it a better working comrade for a man than any other. The sheep dog is a better specialist. Among dogs he is the master artist; all the joy in his life comes through his work. Even as a pup it forgoes the aimless gambols of its fellows to prepare itself for its ultimate work, by manoeuvring for hours in the fowlyard practising all sorts of fine tactics on the The finish and polish of its work hens. is something that even an untrained eye can perceive and take pleasure in. It is a frequent boast of many a shepherd that his dog can work a chicken into a jam tin: few of even the most stubborn of cattlemen regard this as wild exaggeration.

But the artistic temperament of the sheep dog unfits it for companionship. It is sensitive: its nerves are as delicate as a hysterical woman's. Swear at it and it

will go off and sulk in the shade. In short, it does not take its place easily in the democracy of a rough and tumble world. In the cattle dog's work there is no fineness or delicacy. There is no room for it. For to keep continually on the heels of lagging cattle and bustle them ahead especially when horses and men are dusty and dead-beat, calls merely for strength and tenacity and rarely has any of the qualities of an artist. Its nerves are tough as greenhide; its temperament is happygo-lucky. Growl at it for chasing a beast too far into the mob and it will merely retreat to repeat the trick again at the first chance.

However, unless a dog is to lie lonely and cold underneath the stars and not warm on his master's swag by a smouldering log, he must have a trace of the sheep dog's sensitiveness, allied to his sturdier framework. To the stockman books are a poor substitute for companionship: they lose their salt when they are elevated to anything but a pleasant retreat. It is a strange thing that to a good dog, companionship with other dogs is insufficient; it seeks always some deep attachment to a human being, and has a sense of incompleteness if that is denied it. This same dog can be hounded from boundary to boundary in return for a friendly eye, kindly word and gentle pat at sundown.

Surely that curious wistfulness in many a dog's eye and friendly twinkle in the stockman's eye, are the products of loneliness. In those wide silent places, it's not good for any man or dog to dream too long alone.

R. GRIEVES, I.

### VITAMINS IN ANIMAL NUTRITION I. D. HALL, B.Sc. Agr.

Of quite recent years, much publicity, both scientific and sales promotional, has been given to the ever-increasing practice of supplementing the feed of livestock with vitamin additives, to improve health, growth and reproduction. Since this subject is regarded as somewhat controversial, it may be of value to endeavour to clarify the position by a brief discussion of the present stage of development,

That vitamins are necessary has long been established. Dr. Rosenberg (1)states that vitamins are organic compounds which are required for normal growth and maintenance of life of animals, including man. All known vitamins, with the prob-able exception of vitamin D, are synthesized by plants, and are used by them essentially for the same purposes as by man and animals. As vitamins, again with the exception of vitamin D, are not synthesized by animals, they must be obtained by them from outside sources, the simplest method being by intake with the food. It must be borne in mind, of course, that vitamins are not foods-animals can live without vitamins, but certainly not without food.

Vitamins, then, are necessary for normal growth, but what is the standard of normality, and how is "normal" growth to be assessed? Standards for the average daily requirements of vitamins have been determined, and it is expected that, under normal conditions, with the wide variety of foodstuffs available, these requirements are obtained from the normal diet. However, even when the intake of vitamins has been considered adequate, there has still been evidence of vitamin deficiency conditions, as shown by Dr. Sobel (2) in his clinical studies.

This would appear to strengthen the case for the positive use of vitamin additions, but Dr. Franklin (3) in his studies on the use of vitamin D3 supplements for sheep, has reported that not always was a significant response obtained. This apparent contradiction can be explained by the extreme complexity of the problem of absorption and transportation of vitamins throughout the body, and the fact that efficient utilisation of vitamins is dependent upon so many factors.

Many workers have established, however, that the use of vitamin supplements has proved very beneficial. C.S.I.R.O. research workers (4) and Dr. McClymont (5) have reported on the value of vitamin A supplementation of sheep during extreme drought periods, and Dr. McClymont and Mr. McDonald (6) on the advisability of supplementing the diet of poultry at all times. All of this work has emphasised the value of supplementing the feed of young stock which tends to lack the required amounts of vitamins and whose vitamin reserves are built up progressively with age. Consequently, they suffer more than adult stock with vitamin deficiencies and derive much greater benefit from supplements. Adult stock, particularly those not being used for breeding, are much better able to withstand vitamin deficient conditions, but all stock are better if the rations fed to them when young are sufficiently rich in vitamins.

The problem here of course, is to be sure that the rations fed to livestock do actually contain sufficient vitamins at the time of feeding. Supplementation of the feed with vitamin preparations of known potency is a positive means of overcoming the difficulty, and for this reason can be recommended.

In most countries of the world, therefore, vitamin supplementation of stock feeds is now a well recognised procedure, and, particularly for poultry, may be regarded almost as "normal" practice. In other words, the "normal" standard has been raised by the use of vitamin supplements, and what was accepted previously as normal growth, is now regarded as inferior. This has centred attention on the vitamin supplements themselves, and great progress has been made in their development for a wide variety of applications. Products are now prepared which are convenient to use, appropriate to the type of feed and highly resistant to deterioration, and they are available as oils, aqueous solutions and dry powders. Furthermore, recent research has led to production of the normally fat-soluble vitamins A and D in "water soluble" forms, as a result of considerable reduction in size of the vitamin particles and the use of appropriate solubilisers. The work of Dr. Sobel (2) has shown that absorption of vitamin A by the human system is more efficient from aqueous solutions than from oils. This is also the case with animals other than sheep, and further work is at present in progress at the C.S.I.R.O. to establish whether this applies to sheep as well.

The primary aim of the use of vitamin supplements is to promote the health and well being of livestock grown to supply man with many of his needs. When the wool, hides, milk, meat or eggs of livestock are thus improved, the first benefits are to the farmers themselves through increased profits, but the other important feature is that this improvement also means much better quality products, particularly foods for human consumption, for sale at home and abroad.

On the matter of cost of supplements, vitamin A is considered to be rather expensive, particularly in comparison with other commonly used vitamins (e.g., B and D). This is because its production is a somewhat costly process, and also it is used to a much larger extent than others. Although benefits derived from the use of supplements far outweigh their cost, these benefits are not always obvious to the farmer and he may consider the expense unwarranted. Continued scientific research aimed at proving conclusively the value of supplements, and improved factory production methods with consequent lowering of costs of vitamin products, may together result in inclusion of vitamin supplements in the normal diet of livestock. At this stage it appears that vitamin supplements are well worth while for specific purposes, whilst the least that can be said of them is that they are "good insurance."

The position can, therefore, be summarised as follows:---

- (a) Vitamins are necessary for healthy growth of livestock.
- (b) Although it can be assumed that normal feeds provide vitamins in sufficient quantities, the use of supplements has proved beneficial, particularly for young livestock.
- (c) Commercial vitamin preparations of a

high standard are available for use as supplements.

(d) Improvement in health of livestock through vitamin supplementation results in production of higher quality products, especially human foods, for general consumption.

### REFERENCES

(1) "Chemistry and Physiology of the Vitamins."

Dr. H. R. Rosenberg.

(2) "The problem of the Absorption and Transportation of Fat-soluble Vitamin."

Dr. A. E. Sobel.

(3) "Vitamin D Requirements of Sheep with Special Reference to Australian conditions."

Dr. M. C. Franklin.

[Reprinted from "The Australian Veterinary Journal," Nov., 1953.]

- (4) "Vitamin A—Its value in the Drought Feeding of Sheep." [Rural Research in C.S.I.R.O., No. 13, September, 1955.]
- (5) "Vitamin A Supplements for Sheep. Their Limited Role." Dr. G. L. McClymont. [Agricultural Gazette of N.S.W., Nov.,
- (6) "Scientific Poultry Feeding."
  Dr. G. L. McClymont and M. W. McDonald.

[A N.S.W. Dept. of Agriculture Publication.]

### THE FOOT ROT PROBLEM D. F. Stewart, D.V.Sc., Dip. Bact., C.S.I.R.O., McMaster Animal Health Laboratory, Sydney, N.S.W.

With the continued wet seasons contagious foot rot of sheep has spread widely and has appeared in many areas which are usually free of the disease. Other foot diseases have also become rife and the woolgrower is often perplexed as to whether he has true foot rot on his property or not. There are a number of distinguishing features of true foot rot. Firstly, it is a specific contagious disease and cannot arise spontaneously. If it appears on a property where it was previously unknown it must have been introduced either with sheep brought onto the property for by contact of the sheep with recent contagion either on roads, stock routes or some other source of infection. It is fairly readily differentiated from foot abscess. Foot rot under the present weather conditions has a high incidence, many of the flock are affected and sheep of all ages and breeds are susceptible. Both claws of the foot are affected and more than one foot can be affected. There is little pus formation and the disease persists unless steps are taken to eradicate it. Once the disease is introduced vigorous measures are needed. These are the main points in the treatment and control of foot rot of sheep. All cases must be detected and isolated. All infected paddocks must be spelled for 7 to 14 days. The feet must be pared adequately to expose all infected tissue and an efficient medicament must be used on the feet. Finally, infection of clean sheep must be prevented.

Foot abscess is also very prevalent at present and has become more common and more serious with the wider use of improved pastures. It can be particularly serious in lambing ewes crowded onto an improved pasture. Often a large percentage become affected and the lameness discourages the ewe from grazing adequately. Consequently pregnancy toxaemia frequently supervenes. Foot abscess arises spontaneously and is not necessarily introduced onto a property. It is usually seen in adult sheep but weaners may be affected although they usually clean up quite readily themselves. One claw only is affected and usually only one foot. Pus formation is characteristic; indeed the lameness arises from imprisoned pus. Antibiotic treatment has so far proved disappointing and the best treatment is still to release the pus by surgical means and to place the sheep on a dry surface.

The picture has become confused recently by the appearance of another foot condition commonly termed "scald." This appears quite extensively, mainly in sheep on improved pastures and superficially resembles true foot rot. There is a high incidence and the sheep are acutely lame. The posterior third of the sole may be underrun and become separated but the hard horn of the walls remains firmly attached. These cases respond rapidly to simple foot bathing in 5 per cent. formalin without paring; true foot rot will not heal without paring and exposing the diseased tissue to treatment.

The demand, of course, is for a method of prevention of foot rot and present research is directed toward that end. Unfortunately the disease does not respond to conventional methods of vaccination. If it did so the problem would have been solved many years ago. Nevertheless the disease has many peculier characteristics and the present study might reveal another method of attack. The causal organism is very vulnerable, it does not form resistant spores, it will not grow in the presence of air and dies rapidly away from the diseased foot. It causes no other lesion in

any other part of the body, except artificially around the horn of the head, and it will not cause disease even in the feet of other animals. Therefore the organism must have very unusual and specific requirements for growth. Apart from any other reason, we know that this is so because it is extremely difficult to grow the organism under laboratory conditions. Present studies are directed towards disclosing its growth requirements and subsequently the means by which it causes this peculier disease of the sheep's feet. Furthermore, once it can be grown in the laboratory in the natural state in which it occurs in the diseased feet it will be possible to re-examine the chances of developing a method of protection. This programme of research involves a difficult and complex study and even if the information sought is obtained it does not necessarily mean that a method of prevention of the disease will automatically follow.

#### **Epileptic Epitaphs**

Here lies the body of Mary Ann Lowder, She burst while drinking alka selt-zer powder:

Called from this world to her heavenly rest.

She should have waited till it effervesced.

#### \* \* \* Renovations Department

There was a lady from Wantage.

Of whom the Town Clerk took advantage;

Said the borough Surveyor:

¥

"Indeed you must pay 'er,

You've totally altered her frontage." —Anon.

#### . <u>x</u>

-Anon.

#### \* Doggerell

A dog you know is just a brute, And but for barks and growls is mute. He shows dislike or deep devotion By simple hermonec appendix motion. The index of his value scale Is the amplitude of his rump plus tail. And tho' he wags it quite a bit, He never means no 'arm by it. A dog's repression-trained reflex Has nothing whatever to do with sex. His worst frustrations merely chafe O'er a cat up tree, or joint in safe. And the crux of his philosophy— The beginning of Hamlet's soliloquy— X equals 2p or not 2p.

### SPORTS CLUB REPORT

This year so far has been a fairly good one as far as Veterinary Science is concerned. We are lying third to Medicine and Engineering in the Penfold Shield having won the Football and Rifle Shooting and obtaining second place in Athletics.

However, one feels that the Faculty could be in an even better position if those elected to committees in the Sports Club fully pulled their weight. This year we had no Boat Crew and no team entered for the Golf. No matter what is said, it finally boils down to the fact that those people on these committees have let the Faculty down. There is an excuse for not winning but there is no excuse for not

### SWIMMING REPORT

Veterinary Science was probably not the winner of the 1956 Inter-Faculty swimming—it was unfinished. However, if the carnival had been completed we might have won the relays since our enthusiastic team was conserving energy for these final events. Sports Representative John Bryden turned up and was so disgusted at the disorganisation (which denied us the opportunity of winning) that he wrote a screed of righteous indignation to Honi Soit.

Star swimmer Bob Steel didn't even get wet. Point score getter Ahrens, came third in two events. Guyot and Chong won some Fresher's events so that with more support from the junior years, we expect better results from future carnivals.

## ATHLETICS REPORT

For the second year in succession this might be called the Rothwell-etics. We owe our second position in Inter-Faculty to Terry Rothwell—University Club Captain and Club Champion. At the University Carnival he won the 120 yds., 220 yds., 440 yds. Hurdles and the Long Jump and retained the Harvey Sutton Cup for Champion Athlete.

A member of the Australian Universities' Athletic Team, he won the 220 Hurdles at the Intervarsity Carnival in Melbourne.

He also represented New South Wales at the Australian championships.

We wish him luck in his quest for Olympic representation as he is a member of the N\\$.W. Olympic squad.

entering. Let us see that next year we enter in everything.

On the brighter side, the Tennis Committee has shown activity, and the finals of both singles and doubles are all that have to be played. We have also uncovered the Brellingham-Moore Shield to be awarded to the Faculty Singles Tennis Champion—apparently it has not been awarded since 1940.

Winning the Interfaculty football was, of course, our crowning glory and we hope that next year we will be able to do even better in some of the less publicised sports such as swimming and golf.

JOHN BRYDEN, Secretary.

### **TENNIS REPORT**

For the first time for many years, and due to our free Wednesday afternoon, the Tennis Committee has reached the stage where only finals remain to be played in both Faculty singles and doubles.

In the singles, Neville Japp will play John Bryden and in the doubles, Peter McCormick and Barry Larkin are due to play David Galloway and John Bryden.

The Inter-Faculty tennis is held in third term and we hope to make a creditable showing.

One item of interest uncovered this year was a singles shield—the Brellingham-Moore Shield to be awarded to the Faculty Singles Champion. This was last awarded in 1940.

This year we have again been hampered by inclement weather. With early planning and willingness to play by those who enter Faculty Tournaments, we should complete a tennis tournament each year.

## SHOOTING REPORT

It is apparent that many people are unaware of the existence of Inter-Faculty Rifle Shooting whilst those who do recognise it as such, tend to think of the event simply as a day spent at Anzac Rifle Range with no serious job to be done. This fact is reflected in the small number of teams entering the competition—four in all.

However, this apathy towards rifle shooting in Veterinary Science was drawn to a sudden halt with the reappearance on the scene of Bryen Saunders, a onetime University "Blue." The Sports Executive was shocked to learn from Bryen that several years ago, a new .303 calibre rifle had been purchased by the Faculty. This weapon cost a considerable sum of money at the time. Enquiries as to the whereabout of the rifle drew blanks in every case and it was concluded that some person had a supposedly better use for it than Inter-Faculty shooting.

The Veterinary team consisting of Bryen Saunders (4th), Mike Cartridge (3rd), Tony Priestly (3rd) and Ian Bragg (1st) were successful in winning the competition by a margin of eight points from Engineering with Dentistry third. All teams competing, shot from 900 yards and with a stiff breeze blowing, the Faculty team did well to average about 45 out of 50.

The win was made possible by the excellent coaching of Bryen Saunders. His experience in coaching and shooting under adverse conditions would be a great advantage to any team.

It is hoped that in future, instead of choosing the team from College members of the Faculty alone, there may be sufficient interest in this competition to warrant a trial the week before the competition. This being the case, several dark-horse marksmen could be drawn to the fore to prove again, that Veterinary students are equal if not better, to other Faculties in all sports played.

M.C.

A resourceful friend of ours had been on a binge and now he was trying to sneak into bed without rousing his wife.

So he paused in the kitchen and tied all the pots and pans he could find to a rope. He then proceeded upstairs dragging the rope behind him and muttering happily, "She'll never hear me in this racket."

## \* \*

#### Starkle, Starkle

Starkle, starkle, little twink,

Who the hell you are I think.

- I'm not under the alcofluence of incohol,
- I'm not as drunk as some thinkle peep I am:
- And besides I've only had tea martoonies,
- And anyhow, I've all day sober to Sunday up in
- I fool so feelish, I dont' know who's me yet, But the drunker I sit here the longer I get.

### HOCKEY REPORT

This year, Veterinary Science distinguished itself by losing every hockey match in the Inter-Faculty competition. At the beginning of the season our prospects were quite bright but these proved to be unfounded.

We were fortunate to be allotted money from the Sports Club to buy new hockey sticks so that we now have a full set. Next year the Faculty may invest in new jerseys.

As usual, the Final Year v. Rest game, was a success and both teams left the field in one piece despite the length of iron piping Dave Quinlivan used as a stick.

In future years, it would be worthwhile holding practices as was done with such success by the Rugby players.

H.G.P.

#### GEOGRAPHICAL AGES OF WOMEN

- [Prepared by the Males of the Department with the closest co-operation of Females
  - of the Department.]
- 10 Years and Under.—Like Greenland: Totally undeveloped, but shows promise of great potentialities.
- 10-15 Years.—Like New Zealand:
- Still too small, but undergoing rapid development.
- 15-20 Years.—Like Central Africa: Partly virgin and partly explored.
- 20-25 Years.—Like India:
- Hot and mysterious!
- 25-30 Years.—Like Brazil: Lush and beautiful!
- 30-40 Years.—Like America: Very attractive indeed but extremely
- dollar conscious. 40-50 Years.—Like Europe:
- Mostly devastated, but still interested in isolated spots.
- 50-60 Years.—Like Central Australia: Everyone knows where it is but very few would wanta go there.
- 60-70 Years.-Like Arabia:
- Extremely dry, in fact rather barren.
- 70 Years and Over.—Like United Nations: It functions, but that's about all.

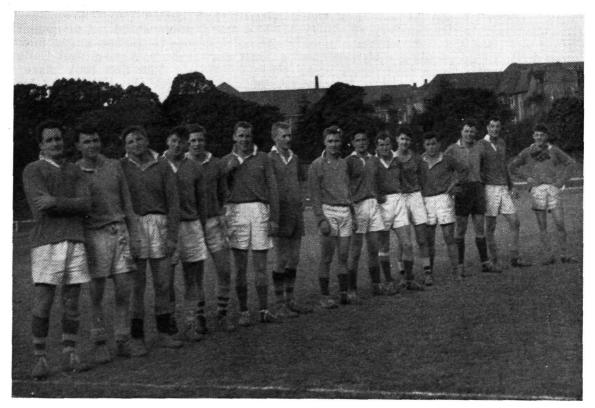
Mary had a little lime,

And rather too much gin,

And everywhere that Mary went, She didn't know she'd bin.

#### CENTAUR

### **RUGBY NOTES** (A TRIUMPHANT YEAR !)



M. B. Harvey, B. E. Goulden, H. M. Williamson, R. G. Steel, I. K. Hotson, J. D. Bryden, T. L. W. Rothwell, G. W. Powell, S. Barron, W. Jonas, W. R. Haywood, S. T. King, J. Phillis, H. van Shaik, C. Burleigh.

At last, after many years, the team representing the Veterinary Faculty, found its true form and annihilated all before it—well, almost!

At the beginning of the season great enthusiasm was displayed by the members of the Faculty, so much so, that during the Trinity Term, the Faculty was able to field a second team which performed creditably (two wins and one loss).

The Faculty Competition this year was expected to reach greater heights than previously as, for the first time, first grade footballers were eligible for the teams. The Veterinary Faculty having only one first grade footballer in its ranks realised that a win in the finals would have to be due to team combination and physical fitness. The result of the final illustrated the keenness of the members of the team, a keenness that well surpassed that displayed by any other Faculty.

During the Lent Term the selectors concentrated on team building and fitness. It was obvious that much of the strength would be in the forwards so the development of a formidable backline was attempted. This effort was rewarded with the team in the competition playing as a well balanced combination.

The early games did not present much difficulty with the team scoring prolifically. However, Dentistry proved rather a stumbling block with a very narrow win over our boys. After recovering from this initial shock the team went from strength to strength and did not lose a subsequent match.

The Semi-Final against Law was our hardest game, at full time the scores were

level, so it was agreed upon that ten minutes extra would be played and, much to the delight of the entire Veterinary Faculty and staff on the sidelines, our team displayed a tremendous effort by scoring two tries and was thus once more in the finals. The deciding match of the year was played against Engineering and, in this most important match, the Faculty team played effective football to win by 12 points to nil.

#### **Game Results**

#### V. Science—won 25-5.

V. Economics—won 19-3. V. Dentistry—lost 6-5.

V. Engineering—won 14-10. Semi-Final:

V. Law-won 12-6.

#### Final:

V. Engineering-won 12-0.

The interest and encouragement shown by the staff and student members of the Faculty during the season deserves special mention.

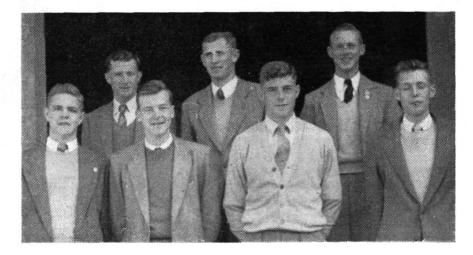
The yearly notes would not be complete without reference to the two games played against Hawkesbury Agricultural College Second Fifteen. The first took place at Ashfield Park with the Veterinary team winning 6-3. The second match was held at Hawkesbury College after the inter-Faculty competition finished. Veterinary again ran out the winners by 6-0.

B.E.G.

Meow!

"I like her new fur coat." "Yes, I hear she got it for services surrendered."

### BASKETBALL



Back Row (l. to r.): R. K. Ryan, T. L. W. Rothwell, N. Anderson. Front Row: A. P. Stevens, D. Cuthbertson, P. Mueke, C. Watson.

This year basketball rose to be one of the most popular Inter-Faculty sports and each lunch time when Veterinary was playing, huge crowds flocked to the basketball arena to view the spectacle. Seriously, though, we did win two matches (one on forfeit) and gave plenty of amusement to the odd bods who turned up to support the Faculty.

The first three games were rather disastrous, being beaten by Agricultural Science, Science and Architecture. However, we learnt the rules and how to play from our mistakes. For example, Agricultural beat us 27-0 in our first match and scored almost half their points from fouls; whereas later in the season, we scored quite a lot of points from our opponents' fouls.

The highlight of our career was against Medicine-unbeaten premiers and yet we led by 4 points with five minutes to go only to be beaten 28-21. We did beat Pharmacy 33-7 only to lose to our arch rivals Engineering in the last game.

Our team was far from experienced— Meuke, Chas. Watson and Speed playing their first games. Ash. Stevens, Norm.

Anderson and Rod Ryan all played well but Dave Cuthbertson held the team together at critical times.

Summing up-we all know the rules now, so perhaps with practice we could do well next year.

### WARM AGGLUTININ

I knew a Warm Agglutinin that worked in our laboratory Who had a most remarkable capacity for oratory. There wasn't any subject that was vague or allegorical Of which my late acquaintance wouldn't make himself the oracle; No germ of an idea that wouldn't take a rapid root in an Unlimited unstony ground—my friend the Warm Agglutinin. The style of his delivery was varied—now declamatory, Now logical, now pleading, now amusing, now inflammatory. He argued about everything, both with and without premises; He spoke for many hours on the Necessity of Nemesis. When two or three erythrocytes were gathered close together He would give them his ideas on the Importance of a Tether; Or a normoblast, regardless of its patent immaturity, Was treated to a talk on the Illusion of Impurity. He said the Song the Sirens Sang was silvery but soluble -A simple thought which made him wax particularly voluble. At first these dissertions were diverting and amusing (We found his manner was, perhaps, a little bit confusing), But slowly we discovered that in any proposition He was never for the Government but with the Opposition. The burden of his argument was always so terrific We never thought at first that he was wholly non-specific; For some of us were anti-this, and anti-that the rest of us But he was anti-everything, reacting with the best of us Eternal Anti-Anti, Anti-Self, and Anti-God, he Was a house divided in itself, and Auto-antibody. While many opportunities were present and get-at-able We never found a blessed thing with which he was compatible. We tried to overlook his faults, his lack of specificity, But all was unavailing, he aroused so much publicity. In spite of all our tactfulness and generous expedients The carried in himself the stuff of civil disobedience. The time arrived at length when we had made our last exploratory Attempt to find a little niche for him in our laboratory; And so he had to leave us for the Desert and the Distance Where, with others like himself, he lives the Image of Existence.

MORAL

The Moral of this anecdote you surely haven't missed— When a man is anti-Everything he ceases to Exist As a Wilful Individual Enjoying the Immunity Extended to an antibody's Work in the Community. (With acknowledgment to the "Lancet.")

Socrates: Died from overdose of wedlock.

Chivalry: A man's inclination to defend a woman against any man but himself.

Gentleman: Wolf with patience.

- Moses: Natural son of Pharoah's daughter and a bulrush.
- Sin: Anything the other fellow enjoys and you don't. ¥.

¥

#### Fashion

- Girls when they went out to swim, Once dressed like Mother Hubbard;
- Now they have a bolder whim,

\*

They dress more like her cupboard.

¥.

¥

Middlesex: Curious affliction necessitating the address, "Dear Sir-er Madam," Christine Jorgenson.

#### CENTAUR

# THE APPLICATION OF THE CURRICULUM TO VETERINARY PRACTICE

Although much has already been written about the present veterinary curriculum in this edition of "Centaur," it appears desirable to give a comprehensive picture of the course as it was in the past, as it is at present and as it may be in the near future.

Over the duration of the Faculty's life —of some 47 years—the chief aim of the authorities and teaching staff has been to cater for the needs of the graduate whatever be his occupation in post-graduate life. Now, it is well known to all connected with the Profession that a great diversity of occupations present themselves for selection to the Graduate; the aim of the curriculum is to provide the graduate with a training to fit him for any of these occupations.

The persistent vision to many of us of post-graduate life is one of clinical practice of one or other of its forms; it is surprising to find, however, that at present time only 50 per cent. of N.S.W. graduates from the Sydney School are now practitioners in N.S.W.

The curriculum aims at giving students a sound knowledge of each subject and branch of that subject without any specialisation up to graduating Bachelor of Veterinary Science. Specialisation in a particular field during under graduate life is undesirable for the particular reason that all students should be supplied with sufficient training in all aspects of the Profession to be able to determine at graduation whether the succeeding step shall be in the direction of research, academic work, public service or general practice. If specialisation was begun at an early stage of the course, there would be but that one road to follow.

The curriculum at Sydney Veterinary School is split up into three main divisions:----

(1) Basic Science Subjects.

(2) Basic Veterinary Subjects.

(3) Clinically Applied Subjects.

The Basic Science Subjects

The first primary division of the curriculum includes not only those subjects taught in first year such as Chemistry, Physics and Biology, but also to the basic

applied subjects, Anatomy, Physiology, Biochemistry and Histology.

Those major scientific topics taught in first year are included in the curriculum not only for their direct application subsequently in practice, but also in an attempt to develop a scientific view point and a broad appreciation of what science The necessity for this early scientific is. training is very evident when it is realised that veterinary practice and research, etc., are essentially the application of scientific knowledge to individual questions or to special clinical conditions or cases, together with some skill, a minimum of both of which is required of the veterinarian by law. Chemistry, for example, is required by pathologists, clinicians and others. It seems difficult to visualise an adequate Post Mortem on an animal suspected dead from poisoning being conducted without it; or a case of nephritis diagnosed without a urine analysis.

Biology, incorporating Botany and Zoology has even greater significance in introducing the future veterinarian into the secrets of science as applied to living things. Not only does Zoology give the student a perception of the evolutionary processes but it indicates the idea of comparison between structures of organisms throughout the phylogenetic scale, this factor being carried on—and exploited fully in the later stages of the course in the study of such subjects as Anatomy,

The necessity for knowledge of many physical phenomena (for example x-rays) is self evident.

Despite the direct relation of first year subjects to Veterinary Science, it seems apparent that there is an almost universal boredom shown by students towards these subjects. There are two contributory factors. Firstly, boredom occurs because the majority of the subjects are taught with surprising detail in secondary school education; secondly, the student feels that he will never get "his teeth into the true Veterinary course" by the continued repetition of the basic science subjects.

In the younger days of the Faculty when the course covered four years only, in order to counteract the feeling of boredom, a subject having a direct application to Veterinary Science was taught in the first year. This course was called Veterinary Anatomy I or Veterinary Osteology. Here the students were taught the essentials of osteology. It had the desired effect of creating much interest, and it supplied the student with a taste of "things to come." In addition to the osteology, students partly dissected a dog. The aim was not necessarily to obtain anatomical detail, but also to accustom the student to dissection itself, to enable him to gain experience in that art so that he would be fitted to dissect with confidence and dexterity at the beginning of the second year Anatomy course.

About the time when the Veterinary course was extended to five years it was realised that first year was being overtaxed with work due to an extension of the physics course; Veterinary Osteology ceased being a first year subject. Its place was taken by an introductory course in Animal Management, this being examined only at the end of Second Year. However, as was expected students failed to bother with the subject and it was deemed necessary to transfer it to Second Year as a course proper.

Again, this question has come up recently. The view of some Faculty members (as expressed by the Editors of this magazine) regarding the inclusion of Agricultural Botany in First Year in addition to the Botany taught there already, requires some consideration.

At present an introductory course to Veterinary Science is given by a number of lecturers on a wide diversity of interesting subjects.

This course is not an examined one; it is intended to be an entertainment type of course stimulating the interest of the First Year student, in his future Profession.

In including this subject, may it be emphasised that despite the alleged importance of First Year "Basic Science Subjects," a course of some kind or other in "Applied" Veterinary Science is most necessary to stimulate interest.

It would assist in preventing students changing their course after First Year due to reports on the difficulty of the Veterinary Curriculum.

#### Veterinary Anatomy

The horse is taken as the type of dissection and the topographical anatomy of the other animals is subsequently dealt with in a comparative way.

The subject is of obvious importance; it is necessary in supplying to the student a sound knowledge of topography in order that he may apply it concurrently with Physiology to the relative functions of organs in different species of domesticated animals. Furthermore, it has direct application in the fields of Pathology, Surgery and Medicine. The section that concerns us most at this juncture is the method of teaching and learning.

Anatomy cannot be learnt from a book: it is almost universally regarded as being necessarily learnt from the dissection of the animal concerned. Therefore the desirable course is one of an entirely Topographical Anatomy, where all is learnt by actually seeing the parts described. Where this is not possible (as in the case of such structures as the Inner Ear), models are the best substitute supported by lantern slides and sections. The use of models will help the student to obtain a sufficiently good minds-eye-view of the structure concerned, and to be able to identify the detail when confronted with 9 specimen.

In addition, one "school of thought" maintains that the seeing of the actual colour of the structure concerned is essential; not the preserved colour. It is doubtful whether the student would ever again see the preserved type. The importance of the normal colours of the macroscopic structures for future reference is self explanatory.

The Sydney University students are fortunate in that fresh specimens are demonstrated throughout the two years Anatomy course.

Comparison is not only the most logical and instructive method but also the natural tendency when learning a group of similar structures. For any comparison one obviously requires a standard on which to base one's comparisons. In the Sydney Veterinary School the Dog was first taken as the "type," as it was then considered to be nearer the typical mammalian type; having five digits. However, the dog was discarded in favour of the horse as the type animal, largely on account of size and ease of dissection of the latter. The dog shows a wide divergence of its anatomy from the herbivorous animals so important to the Veterinarian as they are food producers.

It is of interest to note that at the Queensland Veterinary School the sheep is taken as the basic anatomical subject, the other animals being studied on a comparative basis.

A suggestion that Veterinary Anatomy should be treated rather as true "comparative Anatomy" and be available to students in other faculties was put forward. The scientific advantages of such a method are obvious. However, lack of accommodation prevented the adoption of such a course, and some members of the Profession also felt that "Veterinary" Anatomy was more suitable for those undertaking the Profession.

Veterinary Physiology as taught in Third Year deals with three principal topics, viz., Endocrinology, Digestion and Neurrophysiology, the latter being a more advanced course than taught in Second Year. It is apparent that these subdivisions of the course are not vastly different from those taught in other Faculties, for example in Medicine.

In the University as a whole there are departments of Physiology in several of the Faculties, where, to a large extent the same overall topics are discussed. Surely a system more conducive to liason between the top Physiologists and the Physiology research workers would be a combined Physiology School, in which there co-existed specific departments to deal with and lecture in the more specialised subjects to those students whose curricula demanded it. There is no obvious reason why Professors of the particular branches of Physiology could not remain separate identities and yet work in close contact with their associates. This proposal would be conducive to a higher standard of Physiology throughout the scientific Faculties of the University, it would offer greater scientific advantages professionally and might even lead to reduced departmental expenses.

**Biochemistry and Histology** taught in Second Year are extensions of the corresponding First Year courses. The remarks put forward about the essential nature of their "precursors" apply equally to these two subjects.

#### Animal Husbandry

The course has been dealt with at some length elsewhere in this magazine. Suffice to say a little regarding the ever increasing stress laid on Animal Production.

The primary aim of the majority of early graduates of the Sydney Veterinary School was the treatment of disease; almost all efforts were directed towards this goal. Over the decades there has been an ever increasing emphasis on production in livestock management. Concurrrently the efforts of the Veterinary Surgeon have been increasingly directed towards increased pasture production, breeding of better livestock and prevention, of disease.

It is of interest to note that some countries have not shown this trend; they have remained more associated with the more strictly Veterinary fields than with emphasis on Animal Production.

Sydney Veterinary School has been described by a leading British Veterinarian as the leading school in the British Commonwealth in so far as emphasis on the importance of animal production is concerned. In fact we were the first Veterinary School in the Empire to acquire an Animal Husbandry Farm where research and instruction would be carried out concurrently.

An extension of the course into Final Year deals with the more directly applied divisions—Livestock Economics, Applied Genetics and so on.

#### Pathology, Bacteriology and Parasitology

The first of these applied subjects is taught in Third Year, the last two in Fourth Year. They are obviously of major importance from the Veterinarians point of view-and little comment need be given on them. The practical courses in all are extensive and the volume of material to be learnt is very large. In fact it is somewhat of a deterrant to students to be suddenly confronted with a great pile of printed notes, and told: "Know these and you will know the subject." This is a difficult task in the all too short time allotted to these subjects to obtain a good overall picture of the subject at hand, let alone to learn in detail that which must of necessity be

known. Increased time spent on these major subjects would certainly not be time wasted.

#### Pharmacology

This is an applied subject taught in Third Year Veterinary Science. Concurrently instruction is given in Materia Medica and Pharmacy.

Up till the beginning of this year, Pharmacology was a subject separate from Materia Medica and Pharmacy. Due mainly to the decreasing importance of the latter two sections over the last few decades, they have now been incorporated into the single course. There are several reasons for this.

Firstly, there appears to be far less stress laid on the knowledge of natural sources of drugs and their forms, principally as a direct result of the more modernised methods of chemical synthesis and commercial production. Secondly, the prescription containing the greatest number of ingredients was once regarded as superior. In modern times the opposite to this statement now holds in many cases. Thirdly, due probably to an increase in overall mechanisation and manufacturing in Australia, many drugs are now prepared ready for use by various companies, each one giving the drug its own specific trade name. Consequently, there is less need for thorough knowledge of Pharmaceutical methods than in the past.

The Applied Clinical Subjects include Medicine, Surgery, Obstetrics and Meat Inspection, these being dealt with in the Fourth and Fifth Years of the course. The chief object in instruction given is that everything should be dealt with in the most practical way possible. Practical diagnosis is of particular importance in this regard.

A very important aspect of this group of subjects is disease prevention.

The ancient saying — "Prevention is better than Cure," should be continually in the back of the mind of any Veterinarian whether Government Departmental Officer or practitioner. Here the significance of quarantine measures is stressed. The magnitude of the damage that could be effected by the accidental introduction of "Foot and Mouth" disease or Rinderpest into this country is incalculable. If the rigid policy of control of Contagious Bovine Pleuropneumonia were relaxed stock losses could rise to gigantic proportions.

This danger may be of an even more serious nature in the future when the population of Australia is very significantly increased and the available food supplies are dependent on the primary producer.

Practical Clinical Training is divided into two parts:----

#### (1) Fourth Year

Clinical work is carried out by the students at the Sydney University Veterinary Clinic and Hospital. It deals with the fundamentals of clinical work, diagnostic methods and treatment of clinical cases. The course provides experience in receiving clinical cases, mostly small animals and horses, obtaining clinical histories and practical diagnosis, this being either confirmed or rejected by the house surgeons or other members of the staff. Treatment is suggested, and, if confirmed, is carried out by the student.

An important factor in the topic of clinical work is the close association of the Veterinary School with the McMaster Laboratory where a great deal of experimental work on sheep is performed.

#### (2) Final Year

At the University Farms, Fifth Year students spent some six weeks obtaining experience in clinical work associated with the economic food producing animals, mainly dairy cows and pigs. In addition lectures and discussions are held dealing with the more important diseases of these animals and the clinical diagnosis, treatment and control of them.

#### Extra-Mural Work

In order to cover all types of districts with their specific problems, final year students do three months extra-mural work, this being arranged by the Faculty. The experience gained is with a Veterinary Practitioner, with a Government Veterinary Officer, with a Poultry Practitioner, in a Veterinary Diagnostic and Research Laboratory and in Practical Meat Inspection.

One of the main objects of the extramural work is to provide the student with an opportunity of seeing the various branches of Veterinary Science as applied in every-day life of the community.

### Six Months' Practical Experience

Over the period between the start of First Year and the beginning of Fourth Year, each student is required to complete a period of not less than six months' practical work consisting of experience in management of all species of domestic animals and in allied practical subjects of the course.

At the present time the work to be done is arranged by students themselves, the properties on which they work being chosen individually.

There is some danger in such a system. A student may obtain work on a property which is mismanaged. He may miss the opportunity of viewing from inside and out how a well-managed property is administered.

It would be advantageous to students if they were able to choose from a number of selected properties where approved methods of Animal Management are adopted.

#### Libraries

The Veterinary School Library is a section of the Fisher Library. It contains the majority of the text books and reference books required together with a great many pamphlets and articles of interest from overseas and from Australia.

Over the last few years there has been increasing use of the library; let it be stated here however that at the present the library appears to be closed more often than open. If the Librarian were to extend the hours somewhat it would be greatly appreciated by many.

In the McMaster Laboratory is situated the C.S.I.R.O. Library and also the A.V.A. Library. Both of these are available to students; they contain a host of information collected over the years. If they have not been examined by junior students, they most certainly will be of major importance to final year men.

In conclusion, from this account of the Veterinary curriculum and its adherants it may be apparent that the whole purpose of the course is to produce a practical man, one who is on an equal footing with property owners as regards animal and farm management generally; also a man who deals with his diversity of problems

from an economic and practical stand point. At the same time he must be a scientist ready to investigate further anything which is not fully understood by him. Proof of the effectiveness of this purpose is provided by a brief analysis of the occupations of our graduates. It is found that graduates not desiring to become Veterinary Practitioners have acquired suitable training over their course to work as Veterinary Officers to Dairy Companies, to Studs (where they perform clinical work largely associated with breeding), to Pastoral Companies, Banks and to Commercial Firms; they are able to take up responsible positions in the Commonwealth in Animal Health and Quarantine. Meat Inspection. Research. in the Department for the Interior, in New Guinea, in Commonwealth Serum Laboratories or in the Divisions of Animal Industry. If graduates so desire they are capable of setting up Private Practice, Private Laboratories, partly or wholly owned by commercial firms, as owner of Studs and as proprietors of Farms and Stations.

The fact that many are indeed following up these branches is demonstrated in a recent census; in N.S.W. at the present time, of graduates of Sydney Veterinary School, 51% are Veterinary practitioners, 18% are Government Departmental Officers, 6% are in private companies, 5% are in the C.S.I.R.O., 9% are on the academic staff at Sydney University and 8% Stock Inspectors. The remaining three per cent. have advisory occupations or ownership of studs and properties.

The total number practising in New South Wales at the present is 264; in addition 55 non-practising and retired Veterinarians are in executive positions or are working on the land in a nonprofessional capacity.

#### Bulletin

The Lady Semolina Buff-Orpington laid a foundation stone this morning.

¥.

Both are doing well.

48

### **BEEF EXPORT: THE DRIP PROBLEM**

The problems of beef production in the paddock are well known to the Veterinarian. But increased production of better quality beef is useless if it cannot be sold on the overseas export market.

Leaving Government economic subsidies and other such policies out of the discussion, Australian beef suffers from a very serious consumer prejudice in the European market. This is due to the fact that the majority of Australian beef exported is frozen and not chilled.

In the thawing out process frozen beef becomes covered with a watery exudate known as drip. This is most unattractive in appearance and it is not surprising that the British housewife does not buy such beef when the chilled Argentinian product is available.

It has been a matter of some contention whether the chilled product has any pronounced advantages over the frozen beef. Work by the Lower Temperature Research Centre at Cambridge and by C.S.I.R.O. has been conducted into this problem.

Chilled and frozen beef were compared on the basis of cooking properties, flavour, and nutritional properties. It has been convincingly demonstrated by both trained and untrained tasters that in cases of beef of equal slaughter quality, the freezing process does not affect the eating qualities of the beef. The untrained tasters were representative groups of British housewives who in many instances had been violently prejudiced towards Australian frozen beef, and who were very surprised to discover that frozen meat was palatable.

However, so much has the appearance of frozen beef been against it that publicity campaigns have not been successful.

Prior to the war C.S.I.R.O. were able

to develop techniques which extended the life of chilled beef to nine weeks. As a consequence of this up to twenty per cent. of our better export types of beef were being exported in a chilled form at the outbreak of war. As a consequence of this some of the market lost in 1928-1930 to Argentina was regained.

During, and immediately after the war all beef exported was frozen. With the return to the open market the problem of Argentinian competition became again serious.

The advantages of frozen beef to the Australian export industry are obvious. Nine weeks is the absolute limit for chilled beef export and allows very little safety margin for the frequent shipping delays and storage time in Europe.

All Australian authorities have endeavoured to improve the present situation. The Governments of Britain, Australia, and New Zealand have financed research. The United Graziers' Association urged the C.S.I.R.O. to undertake work on the problem in 1949.

In March, 1955, reports presented by C.S.I.R.O. indicate that at present an increased knowledge of the fundamental processes is being obtained. Much of this work centres around the Biochemistry of post mortem rigidity and the changes in, the muscle fibres involved in the freezing process. At present some progress is being made.

The solving of these problems, together with increased production on the land will make the beef export industry play a more important, and economically sound part in the national economy. It could possibly in the years to come rival wool in its total value to the Nation.

### THE "NONDUGAL" PROJECT

The central highlands of New Guinea have been inhabited for centuries by native peoples varying greatly in their sociological development, but uniformly primitive and unadvanced economically.

Penetration of these highlands first took place about 1920 and the initial exploration was mainly carried out by missionaries and prospectors. The first anthropologists were the missionaries.

In an area around the Nondugal Mission established in the highlands, the native people were forced by their lack of clothing to adopt methods of housing which lead to widespread ill health.

In the evenings as the temperature

dropped they would crowd into huts (accommodating about seven), which were built around a central fireplace. The huts were round in shape, with a small entrance and a very small chimney opening. The occupants would sleep lying with their feet towards the fire. During the intensely cold nights the huts would fill with smoke because of the lack of ventilation.

Consequently the incidence of tuberculosis was very high, and a high proportion of the population suffered from abscesses and infective conditions of the hips due to the abrasion of the skin resulting from the method of sleeping.

In the post war years some thought was given to prevention of such conditions rather than simply curing specific disease cases. The crux of the problem was to provide the natives with sufficient clothing and bedding to enable them to abandon their unsanitory sleeping houses.

Sir Edward Hallstrom, the well-known Sydney philanthropist, attempted to assist the native population, at his own expense he founded an experiment station at Nondugal and flew nearly three thousand Romney Marsh sheep from Australia. The cost of this alone was in the vicinity of ten thousand pounds.

Romney Marsh were chosen on the advice of the Territory Administration authorities as it was considered that they were the most suitable breed for the environment. In addition their wool was of sufficient quality and length to enable the natives to weave their own blankets and clothing.

Environmentally the Nondugal area is undulating, tableland country with a very high (over 100 inches) average annual rainfall, and volcanic soil of moderate fertility. The native pasture consists of a

grass called "kunai" which is tall and vigorous and considered poor sheep fodder when rank.

With the introduction of the sheep, white clover and rye pastures were sown down. However, for some years they did not respond and virtually died out over the first three years.

Grazing practices consisted of shepherding by day and yarding at night. Soon the sheep became very heavily infested with parasites brought with them from Australia. The continual rain and rank grass proved very suitable for rapid parasite reproduction and the lack of fencing and controlled grazing ensured frequent reinfestation.

In later years cattle have been introduced, fencing erected, and strict rotational forced grazing introduced. Kunai when young and coming away after very heavy grazing from cattle has proved to be suitable for the Romneys.

Because of the difficulties encountered in evolving a pastoral management pro-gramme to fit the peculiar circumstances, the original hopes of a native woollen spinning industry have not been realised. However, the experiment has shown that sheep and cattle raising can be carried out in this new environment. As newer, and more locality suitable management practices are developed, these new industries will be incorporated into the native agriculture with consequent benefits to the native population and to Australia. As development proceeds in the Territory the introduction of monetary systems is inevitable and income derived from sheep and cattle will assist in the peaceful transition of the native agriculture from a subsistence to a cash basis.

#### Gardening Corner-or . . . DROPPINGS FROM THE SPADE

and the second second

"Centaur's" own gardening expert has specially prepared a handy catalogue of common varieties for this season's new ...

#### **Gardening Annual**

Avoid the spring rush with its delays and disappointments. Order now, as crops are limited, stating an alternative choice. Homo Sapiens (Perennial)

Dwarf and giant varieties obtainable. With a little experience these are easily cultivated, and there are varieties to suit all tastes, e.g.:— (a) Homo superbus (no stocks available at present): This variety is much sought after. Upright and sturdy, it reaches magnificent proportions.

It is unequalled for permanent bedding and should prove very productive, although we are unfortunately not in a position to state definitely, owing to its rarity.

(b) Homo wolvus: A noxious and showy variety of deceptive appearance.

Easily cultivated, is hardy, blight resistant and extremely prolific. Impervious to frost, it does well on street corners and in shady places. May be, and frequently is, pickled.

A particularly virulent variety of this type is known as Wolvus Americanus, introduced into this country in 1940 as an experiment in cross breeding.

We are not convinced of the success of this venture but it has undoubtedly left its mark in some districts.

Generally of smooth, sleek appearance, tending to oiliness, and varying in colour from off white to near black.

Dangerous in inexperienced hands—not recommended for beginners.

### Wallflower

(Femina solita, femina optimista)

A long standing variety, used chiefly as a decorative border. A hardy type, not easily discouraged. May be cut without harmful effects.

Generally considered not worth cultivating, but a little attention will produce hitherto unsuspected blossoming.

#### Fresia (Femina frigidia)

A difficult flower to cultivate, reacts unfavourably to rises in temperature. May or may not be worth cultivating; no money-back guarantee for failures.

Varies considerably in form and appearance and is consequently often confused with varieties more responsive to care and attention.

In the correct situation the results of perseverance are often surprising. Definitely not recommended except in specific cases.

### COME TO SUNNY SOUTH AFRICA

#### -Waken Shaw

The stench was like that of a pigsty or so the social welfare worker thought but then he hadn't been born in the atmosphere. The shack was made of packing case, tin and sacking. The door, screened by an apologetic scrap of sacking was blocked by a tall, young woman heavy with pregnancy, trying to calm the frightened baby she held in her arms.

"Are you Sarie?"

"Yes baas, what's the matter?"

"I'm afraid your husband Swartland .... he's been arrested for not having a pass."

The girl at the door did not shreik or faint as the welfare officer had expected her to. Then he realised that it might have been better if she had. She seemed completely unmoved and apathetic.

"What will they do to him?"

"Send him back to the reserve. What's going to happen to you and the child?"

The girl shrugged. "I can't get work (and she touched her belly)—my people are dead. Perhaps we shall starve."

Inside, he could see the shack was filthy. In one corner stood a rusty iron bed frame

propped up with bricks and covered with the universal furnishing-a couple of sacks. There didn't seem to be a window but at least the fire had a chimney—an old piece of downpipe fastened at a crazy angle. When he first approached the baby had seemed fat and happy but now he could see that the fatness was just a porridgebelly and the apparent smile was caused by sores on his mouth and face. Over everything the flies swarmed. Whenever they irritated her breast the mother waved them away. What remained of the woman's blouse and her skirt were filthy and the hair of both mother and child was showing signs of lice.

At first he had been going to suggest a servant's position to her but now he realised that no one (even allowing for the current shortage of servants) would try to make a servant of her.

Where were you born, did you go to school, have you ever worked?" he asked.

"Here," she said, indicating the ant heap that was Windemere. "I went to school for two years but then had to stay home to look after my brothers and sisters. After the big fire when they and my parents were killed I worked for a while in a factory but I was fired for being too dirty and then I went to live with Swartland. The first child died of fever."

The crowd opened up a little to reveal his hostess who advanced towards him followed by a neatly uniformed servant bearing a tray of the excellent sherry produced on her father's farm.

"My dear, I am so glad you managed to get here. As you know this is Peter's second exhibition only and I am hoping it will be a success. In a few minutes we shall be going into the gallery. Such a pity you couldn't have heard the Professor's speech a few minutes ago. But of course . . . your work . . ." And she was off, carried away by an eddy of fashionably dressed women and men-about-town with a sprinkling of rather odd-looking young men who could only be Varsity students.

"Yes," his neighbour was saying, "I don't think this policy of removing the natives from the Cape West will ever go beyond the deporting of those without passes and perhaps restricting a bit the issue of passes. The government would never dare to deprive industry of its labour, especially now that Afrikaners have entered the ranks of the entrepreneurs."

Behind him was a student. "I think our head waiter (I'm at Smuts Hall, you know) must know a forger of documents or something. The government has said it is not allowing **any** foreign natives into the Cape West on any pretext and yet we have a continual flow of Rhodesian servants. They find the strain of waiting on us a bit much and don't last long but Jock always seems to have a replacement."

Then everyone moved into the gallery. The room seemed to have caught the sun -then you realised that it was the effect of the paintings on the wall. Every aspect of the South African way of life was reflected there. Here Zulu maidens bathed in a mountain stream, there was a seascape with the breakers throbbing in the sunshine. In one corner nestled a farm house, white gabled and surrounded by velvety-green oaks. Next to it was a street scene-the flower market off Adderley Street with picturesque mammies bearing bunches of flowers that had made the Cape famous. Alongside them was a Malay wedding with a beautiful bride and a noisy band and a procession of little boys eager to join in the fun. In gloomier mood the Cape had been caught in South-Easter time. Table Mountain was draped with its table cloth and van Hunks and the Devil were smoking away behind Devils Peak.

A kaleidoscope of colour, the exhibition seemed to say—Come to Sunny South Africa. Meanwhile outside the rain poured down and in Windermere they watched and waited while the water level rose....

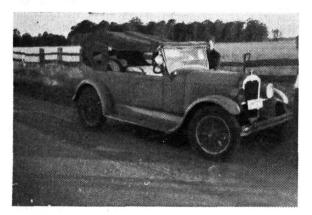
-die end-

### A CLINICAL COMMUNICATION

- PATIENT: A 28-year-old thoroughbred mare "Loosey" by "Oldsmobile" out of "The Running."
- CASE HISTORY: The patient has been presented at the Veterinary School on a number of occasions with various complaints the majority being nervous in origin due to disorders of electrical conduction.

On the morning of 28th July, 1956, the patient proved rather difficult to awaken but after forced exercise for several hundred yards supported by the owners the patient became quite lively and proceeded to the Veterinary School under her own power.

Here it was found that the generation of sensory impulses was rather sluggish and an ampmeter connected across the central nervous system showed a large excess of motor impulses over incoming sensory impulses. Clinically this manifested itself as a slight spasticity. Partial transsection of a main sensory trunk was diagnosed.



The Cadaver.

Using a new surgical technique (suturing with plain twine—gauge 9000) a great improvement was brought about.

The patient then returned home, receiving en route an intra-venous transfusion of 7 gallons of standard petroleum product containing I.C.A. and an intra-cardiac injection of S.A.E. 50 in oil.

As the patient was then in good heart it was decided that an exercise gallop to Richmond would do no harm.

On reaching Ashfield an abnormally large discharge of sensory impulses was observed but the patient seemed in no way distressed and continued the journey at a good pace.

At Lidcombe, however, a crashing, bashing, clanging heart murmur of great amplitude became evident. On auscultation and palpation this murmur was found to emanate from the second heart chamber. Emergency surgery was indicated and under general anaesthesia a neurectomy was performed on the motor nerve to this chamber. The patient recovered quickly, and although showing signs of a definite sinus arythmia was "going well" and showed no signs of tiring at Parramatta.

The first signs of fatigue appeared at a point approximately six miles on the Sydney side of Windsor. This was evidenced as a slowly progressive locomotor paralysis especially marked when ascending inclines. A definite "cardiac cough" was also present at this stage. An examination of the circulatory system was carried out with no significant findings—pulse rate and amplitude normal, circulation rate 10 miles per gallon. There were no signs of fever.

The clinical signs were exacerbated by a sharp incline with death ensuing one mile from Windsor.

POST MORTEM: A complete examination was carried out on the spot, the only significant finding being a 50% decrease in the fluid contents of the abdominal cavity.

### PROVISIONAL DIAGNOSES:

- (1) Specific infectious disease—ruled out due to absence of any evidence of hyperthermia. In addition no specific disease with an incubation period of five miles has yet been described in the literature.
- (2) Central nervous disorder—discarded as a possibility due to the fact that in this species central nervous disorders are characterised by sudden death.
- (3) The only other diagnostic possibility was cardiac failure due to fatigue and senile decay. This was diagnosed accordingly.

The cadaver was bled out (using a garden hose) and the central nervous system removed for return to Sydney.

DISCUSSION: It was agreed by all clinicians attending the case that the intra-venous transfusion prolonged life considerably, but the general opinion was that the viscosity index of the intracardiac injection was considerably in excess of the optimal under the prevailing conditions (high environmental temperature and stress of long journey). This was probably the predominant predisposing aetiological factor in the premature failure of one heart chamber E.R.A.

I like the girls that do;

I admire the girls that don't;

I hate the girls who say they will,

- And then who say they won't;
- But the girls that I like best,
- And I think I'm always right,
- Are the girls who say they don'tquite-know,
- But look as if they might.

### THE MOUNSTER

In the murky depths of definitely the darkest, deepest, dampest, dank jungle of Ostrylyu this formidable mounster was hunted. trailed, stalked, and finally slain.

Mr. Uggle Gugglebloop, who lives in a mud pool at Woollymooloo (short for a cross between a cow and a sheep), was called in by the Virus Squad to hunt down the terrifying beastie which had caused countless fatalities in the Wheat Germin community. To show the seriousness of the situation even the Husky Ruskies (another species of the same family), who only look at Wheat Germins through key holes, bullet holes, and on television, decided to pool their efforts with the Amourikin zone of Wheat Germiny to oppose the mounster, i.e., they were all in the swim together.

Well, Uggle went home, put on his piejamas and the radio, took a hand full of bubble gum (I mean muddle gum) from his mud pool, and set out on the trail of the killer. When he reached the jungle (you see it wasn't a dry reach) where the Mounster of the Animals lived, Uggle turned his boots around so any intelligent (postman's knock for instance) game would think he was walking the other way, then picked up the trail of the beastie (it was just a common tie like all bees After travelling some distance, wear). (naturally he'd have to travel "some distance" wouldn't he, or he wouldn't be travelling), he found the trail getting rather heavy going so he put it down again and let it run alongside as he went on.

After travelling a few months the trial was hot enough to follow by night as the red hot footprints lit up the jungle just like red hot footprints. (In case you're in doubt, this is not just a lot of red tape.) As he was catching up-no, not an "up" -he's chasing the mounster, isn't he? Well, as he was closing in on his prey, Uggle decided to assemble his wuxtry speshul weapon for bringing to earth the terrifying, marauding, crunching, munch-(I'm not sure about this ing mounster. "bringing to earth" business. Perhaps it's a Martian mounster.) Stretching out his last piece of bubble-muddle gum and taking a wish bone from his chicken piejamas (queer rooster, isn't he?) he made what

he called a Catapoultry missile hurlyburler. With this and his bottle of gall stones for hurling he felt greater security. Unfortunately the security he felt was from the enveloping grasp of a huge gorilla. But after a bit of monkey business Uggle managed to persuade the befriending animal that they were of different species and carried on with the hunt.

Suddenly Uggle ran into a ferocious lion -no he didn't, it's road courtesy week. It just appeared on the track in front of him. Uggle was terrified and he shot behind a tree. It would have been better to shoot at the lion than to waste a good gall stone behind a tree, but you can never tell with Uggle. He didn't have to worry about the lion because he had lived in his mud pool all his life and Lifebouy was still a thing of the future. (Just like civilisation As Uggle walked on, the in Ostrylya.) lion opened its huge jaws and displayed its fangs. But brave Uggle kept on walking\_\_\_\_he just stepped over the prostrate body of the Leo as it lay there gasping with Uggle-caused respiratory difficulties. The sight of our hero would probably be sufficient to shock the strongest lion into unconsciousness anyway, as he is a particularly uggly character.

Round the next bend what do you think he saw? It's so hideous even I'm frightened. Yes, it was the MOUNSTER!!! Uggle flew into action! (queer bird, isn't he?). He took his pack off his back, took out the chair he had brought especially for this occasion, stood up on it, clutched his pants and screamed in the traditional manner. Naturally this terrified the animal which sat up and screamed its head off. (Oh no, that's no good because Uggle has to slay it, doesnt' he.) Well the mounster screwed on his head again and Uggle proceeded with the attack. He took out a telescopic sight and trained it on the mounster. As telescopic sights are very intelligent the training of it didn't take long and Uggle could soon carry on. He loaded the Catapoultry missile hurlyburler with a beautiful green gall stone then looked through his telescopic sight. Yes, there he was, and the hairs on the beastie were as big as trees. Uggle took careful aim and fired. He was just in

÷

time to get out of the way of a falling tree. Owing to an oversight Uggle was looking at trees through the telescopic sight. He's just come out of his pool again.

This time Uggle picked up his telescopic sight back to front and when he looked down the track the mounster had diminished in size. So Uggle prepared a matchbox and keeping the sight on the animal he advanced and catching the mounster unawares he popped him in the matchbox. The great mounster kicked and struggled but to his dismay, june and july, he found he was no match for this box.

Uggle travelled with his prize back to the State of Woollymooloo and presented it to the Virus Squad. They were very pleased and took it to a combined gathering of the Amourikin Wheat Germins and the Husky Ruskies. When the box was opened what do you think the mounster saw?—nothing, because he was asleep. But when he saw Mr. Moletov, Mr. Takeya Coatov and others he jumped out of his skin and tore ov back to the serenity of the jungle and this is the trophy. Mr. Uggle Gugglebloop has dropped back behind the scenes, probably into the mud pool. By the way he asked for all of you to drop in sometime.

The trophy mounted above the mantel remains at the last.

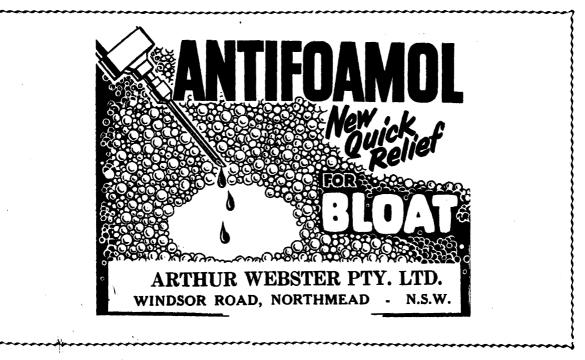
S.B., 2nd Year.

The sensible girl waits to get both rings before showing her hand.

No races have ever overcome the British people except the Derby and the Grand National.



for gawd's sake somebody help me -I can't hang on much longer."



#### CENTAUR

### FIRST YEAR NOTES



FIRST YEAR, 1956

Back Row (Left to Right): A. Fisher, P. Harris, R. E. Jane, F. R. Doughty, P. Wyndham, J. S. Wise, J. Maxwell, J. Curnow, J. Garland.

Third Row: N. J. Harbison, Miss J. A. Todd, J. A. Howitt, M. G. Smeal, R. E. Everett, T. Wossne, J. M. Guyot, K. M. Dash, J. W. Plant.
Second Row: R. L. Grieve, T. Mogess, G. D. Podgwaite, C. Choong, K. B. Ismail, C. Burleigh, C. Fitzsimmons, G. Ford, P. K. J. Gerard, D. M. Charalambides.
Seated: Misses P. R. Harbutt, M. Kirkwood, M. A. Templeton, M. A. Archer, M. R.

Jenkyns, L. de Monchaux.

Absent: I. N. L. Bragg, P. Pickles.

Twenty-four Freshers arrived but aroused no great interest until the four After this Freshettes were investigated. unsettled period the eight returning residents of First Year took notes at some lectures and attended even less. Llovd still studying Vet., Beeby. although obtained exemptions in all subjects and is attending Wagga Agricultural College until November. He was missed in the basketball and swimming but, we hope, will be back next year. This brought the total in First Year to thirty-seven.

Ethiopia sent us two new characters and what with a senorita from Brazil, two guys from U.S.A., a gent from Cyprus, a Chinese and an Indian from Malaya and a number of doubtful ancestory, there promises to be even less Aussies in next year's Vet. II.

A number tried out for the Faculty football, Clinton Burleigh being the only one to play Inter-Fac. The girls figured prominently in the hockey and basketball.

Most Freshers still seem under the mistaken impression that they are here to become vets. only, and once again there was little support at all social functions. As few have yet learnt to lap alcohol and get better roughage at home than that provided by Cahills, the poor attendance at the Dinner can perhaps be understood.

However, it also seems that few have yet learnt to get even near the perfume cloud surrounding the skirted creatures, necessary we believe, for both the Informal and Formal.

Once again Zoology excursions filled up a number of Saturdays. Although not much Zoology was done, except by the demonstrators who talked away in a world of their own, we at least got to know one another a lot better.

In conclusion, we wish other years all the best and hope we will replace and not join too many of them in later years. and not leave too many of our own ranks behind.

### SECOND YEAR



SECOND YEAR, 1956 Back Row (Left to Right): J. Barker, R. F. Deageri, J. D. Butterworth. Second Row: P. J. Kinnaird, H. F. Rujicka, T. D. Brewis, C. M. Roberts, M. A. S. Jones, N. B. Pullan, P. E. Davis, D. J. Cuthbertson, J. D. Cole.

Third Row: P. J. B. West, A. F. Smits, A. P. Stevens, P. C. Taylor, T. D. Heath, H. C. Grant-Frost, J. L. S. Gordan, G. R. R. Murray.
Fourth Row (Standing): D. C. Moore, N. H. Mancer, G. F. Joyce, Judith W. Magnus. (Seated): A. E. Hardcastle, C. B. Holmes, K. J. Kissling, R. T. Wells, P. T. McCormick, G. A. Lester, P. E. Luders, D. J. Richards, J. O'Grady, M. G. McKellar.

Front Row: L. I. Ayalew, H. W. Chapman, Helen I. Jervie, I. A. Shaw, W. E. Jonas, S. J. Barron. Absent: D. M. Chettle, R. Chevis, G. C. Hayes, B. M. Larkin, F. G. Mayne, B. L. Moore,

R. D. Moulton,

#### CENTAUR

# SECOND YEAR NOTES

A number of new faces arrived this year to swell our depleted numbers. These included sixteen New Zealanders, one Tasmanian, three Victorians, one West Australian, two South Australians and one from South Africa. Two First Year survivors left us in favour of an extra year of work in Medicine, leaving eighteen to be joined by the newcomers and six Second Year casualties—making a grand total of forty-six males with two females to cramp their style. Among our new members are many and varied talents—as shown in football, basketball, hockey, drinking and ability to work fantastically hard.

In Inter-Faculty football were Selwyn, Warren, Digby, "Harold Park" O'Grady, Paddy McCormack—until he put himself out of action — Ron Wells and Ash Stevens. Ash., Warren and Selwyn played Uni. football and Ash. and Dave Cuthbertson worked hard in Faculty basketball; while Arthur Hardcastle and Ken Kissling added class to our Faculty tennis tournament. After a great deal of persuasion the Second Year roll-up to Faculty functions was quite healthy but, it is to be hoped that in future there will be no necessity for the persuasion.

Notable events of the year have been: A roast dinner that cooked for the greater part of a day; a bolting stallion; a mighty hurdling effort by Punjab; invariable late lecture dashes by Magnus and/or Jervie; the somewhat bedraggled and depleted appearance of the Year on a certain Wednesday morning at the end of First Term; the even more bedraggled appearance of a few the night before; the application of pink hand cream to the wrong place; the mysterious disappearance of a certain front tooth; the Hurstville parties and the somewhat irate reception given us by a physiology demonstrator following the football final.

In conclusion, we wish all other Years the best of luck in clearing the approaching November hurdles.

### THIRD YEAR NOTES

Having sent a number of our members to assist elsewhere in the world, including two to America, one to N.Z., one each to Malaya and Victoria and several to educate new Second Years; we have now dwindled to thirty-two. We wish all those who "chose" not to stay with us all the best. We welcome the perennials.

Third Year's sporting achievements are so impressive that there is only space for a list.

Football.—Russ Steel (I.-V. rep. and stainless), John Bryden, Terry Rothwell, Graham Powell and Steve King—all No. 1 players in the No. 1 Inter-Faculty team.

Athletics.—Speed and Terry Rothwell. Basketball.—Murk and Jack, Grahame Trevena, Norm. Anderson and Terry Rothwell.

Aussie Rules.—Again Pete Mueke and Charles Watson; also Barry Gilbo and Steve King.

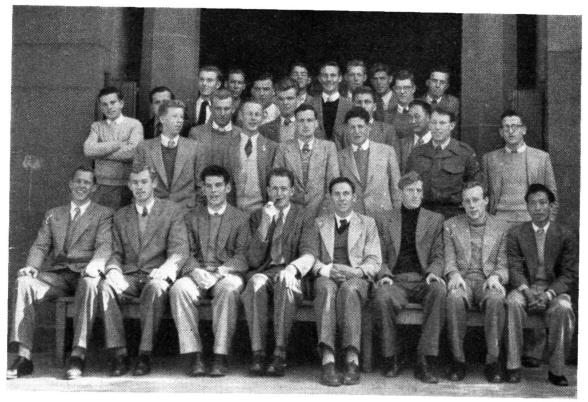
Rifle Shooting.—Tony Priestly and Mike Cartridge did the honours and helped win Inter-Fac. (Cartridge was blank). Swimming. — Bob Steele and John Bryden.

The Dinner, the Ball, the Informal, Wednesday afternoons, Friday, Tuesday and Thursday afternoons (the latter as a sequel to snuffing of rabbits) have all been well celebrated in the usual way by a good many.

Nevertheless it is discouraging to find that all members did not take the opportunity to attend the few social functions which were held on Wednesday afternoons; even some Friday classes were at times poorly attended.

New interest has been added to the course in Agricultural Botany, Animal Breeding and Animal Acts. The last we'll overlook, the second we'll look over and the . . . . and the . . . .!

Apart from the above unexpressed, vague feeling of dissatisfaction the work is far more interesting this year than it has been. Once November is successfully past (passed) we will be well on the way and will begin to feel qualified to speak



#### THIRD YEAR, 1956

Back Row (Left to Right): R. J. Downing, R. G. Steel, C. R. Watson, P. Mueke, W. A. Geering. Second Row: G. W. Powell, S. J. King, D. B. Galloway, H. J. Robson.

Third Row: H. M. Veldkamp, M. W. Simpson Morgan, I. A. McWatters, R. J. Steele, K. K. Leah.

Fourth Row: W. B. Gilbo, G. J. Trivena, N. Anderson, J. Merral, M. E. A. Cartridge, G. A. Stewart, J. F. Cullen.

Front Row: J. D. Bryden, T. L. W. Rothwell, R. T. Dixon, I. R. Ward, A. Priestly, G. C. Hard, D. W. Broadbent, A. R. Omar. Absent: K. A. Twaddle, J. Priedkahns.

with conviction on such subjects as, the details of the jaw bones of domestic animals; the mechanisms of a nerve impulse (you can't hear them); the care of goats (or pigs); Encephalomalacia and hepatic cirrhosis (!); Drug addiction; Blood groups in Sicily; T D N D C P S E and gloom (or glumes).

To all those about to use such professional knowledge we wish every success both for the finals and for the future.

To all others, the best of luck also.

#### × × \*

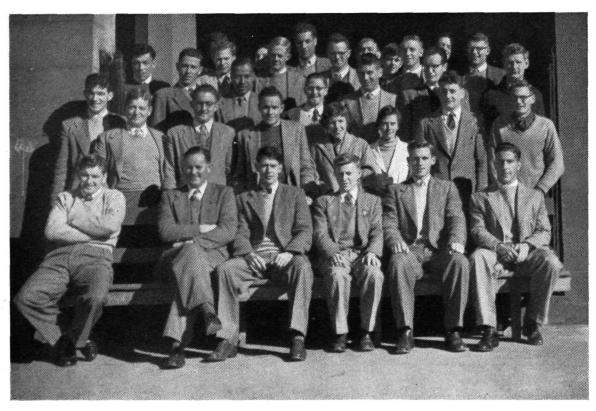
Little Maurice, arson lover, Set alight his younger bruvver, Then he sat on him, no doubt, Just to put the fire out. Though he succeeded—I'm no liar, He's little Maurice, arson fire.

> \* × \*

Tell me, Dr. Kinsey, what is really the vital difference between a man and a woman?

Madam. I cannot conceive.

# CENTAUR FOURTH YEAR NOTES



FOURTH YEAR, 1956

Back Row (Left to Right): E. R. Allen, B. E. Goulden, G. Colley, H. van Schaik, T. O'Shea, G. Watt, P. L. Pemberton, R. Borland.
Second Row: H. G. Pearce, B. Hyllseth, T. J. McManus, R. G. Matthews, R. B. Marshall, B. L. Macey.
Third Row: M. J. Studdart, N. G. Japp, B. White, B. P. Healy, Miss L. Leedham, Miss B. H. Glanville, K. P. McManus, V. Baxter.
Seated: H. M. Williamson, B. R. Saunders, W. K. Hayward, W. P. Richards, I. K. Hotson, V. J. Green.

Twenty-eight students from Third Year and Bryen Saunders from Bathurst way were welcomed to Fourth Year by Laurie Leedham, Vic. Baxter, Ralph Bonner, John Poland and Barry White. We also welcome them to our ranks and especially Laurie who now brings the female number to two; the other one, Betty, is a professed man hater (probably aimed at Graham). We note they always go round together, possibly for protection.

Bryen Saunders is an old hand having been here about '49; he has returned to complete his mission, we hope, successfully. The Year's thanks are due to Mr. Poland who has efficiently undertaken mass ordering and handling of our instruments. Since this was apparently done voluntarily we are curious to know what percentage he gets and how many shares he has in Hannam Ramsay.

Tim McManus ably handled the film projector for the Society; he also ably handled the mouse house inmates and has since become an authority on practical genetics; he has apparently lost interest in the pair in the physiology building.

The S.U.V.S. draws most of its executives from Fourth Year and we congratulate those lucky people but, in particular Ike Hotson (President) and Dick Allen (Secretary) for their sterling activities.

Congratulations are also due to Harry Pearce who is now the proud father of "Little Tim" and Gouldie who tied the knot last Christmas sometime; wifey is now over here from N.Z. and we note has had a definite sobering effect; he even played football this year. Vic. Green has looked after the Book Scheme well, so far he has only embezzled £140 but will probably do better by the end of the year.

Brewery shares showed a sharp rise last March on the return of the New Zealanders. They have maintained a consistently high standard; we note that a few of the Aussies are doing well but are still at long odds. In sport Fourth Year was again pro-

In sport Fourth Year was again prominent. Hopkirk played for University First Rugby Union team—congratulations Dick; lately he has had a couple of broken ribs which he probably got from football. Harvey captained the Faculty football team to victory in which Hotson, Hopkirk, Goulden (Selector and Coach). Williamson, van Schaik, Phillis and Hayward were regulars; O'Shea, Pearce, Borland and Matthews also played. Harry Pearce played for the University First Hockey team and also captained the Vet. team in which Harvey Hyllseth, van Schaik, Hayward, Williamson, Ismael, Borland and Marshall played.

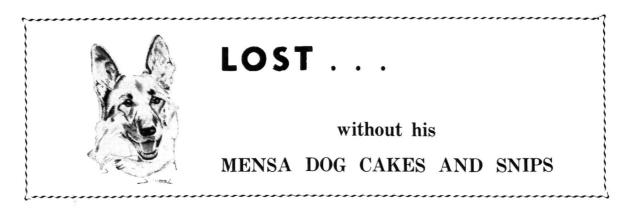
Bryen Saunders captained the victorious Inter-Faculty shooting team and Tim Mc-Manus played for University First Australian Rules team.

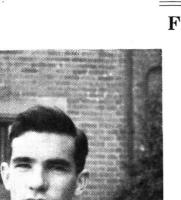
Bjorn Hyllseth deserves special congratulations for again winning the University ski championships.

Finally with the annual cycle of events threatening, Fourth Year wishes the rest "Good Luck."

### FIFTH YEAR

BAILEY, R. T .- Mr. Bailey, or "Shorty" if you are prepared to be familiar, seemed to get more out of Fourth Year than anyone else except Dock (they both got the house surgeons). He used to own a car which seemed to get along quite nicely without mudguards and headlights and he was even known to attempt to run it without one wheel. Later he quit this heap for a later model which was intricately associated with an absence from the Faculty, early morning risings and the aforementioned house surgeon. Snooker and poker have provided Roy with part of his annual College fees for Andrews and he was even known to integrate these successfully with exams at the end of Third Year. For a little fellow he has been remarkably successful at games, being singles tennis champion of the Colleges, having a slashing style at table tennis and always knowing when to, play the joker. We all wish Jan and Roy success wherever they practice.



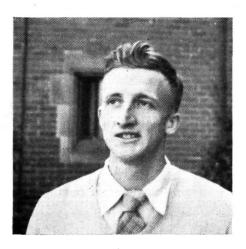


CHRISTIE, B. R.-Entered Faculty as a brilliant student from Melbourne Uni.; one of the best Aussie Rules footballers the Faculty has produced. Brilliantly consistent on the tennis court and in the examination room. In all, a Scholar and a Gentle-man. (Editor's Note: Thank you, Mr. Christie for your self analysis. But now for a few facts for our readers.) Bruce has in turn been thrown out of Ballarat College and Andrews. As cox in 1954 he submitted the Vet. Crew to such an impassioned tirade that he scared them into winning. As S.R.C. rep. he has waffled with the best of them and one suspects he enjoys philosophical meanderings. Has found that unless one's watch is synchronised with the clock in the Stewart, one may rush in at the end of the first lecture, instead of the start of the second. Characterised in Fourth Year for his whirlwind surgery and as he worked each night in a cotton mill to get enough money to get married in May, he did Fifth Year in his spare time. (Incidentally Greta, was he late for the wedding, too?) Future: We guess the Victorian Department brought it upon themselves.

COTTON, W. G.—"Henry" (seldom called Graeme) was Sydney bred and came to us from North Sydney High. He divides his time between the Vet. School and the local tennis club where he surprised everyone by playing in the doubles with a slashing blonde and still being able to keep his mind on the game. He does not smoke or drink, except that is, cigars and cider at Vet. informals. Henry and the old man's Humber always seem to be there to provide transport home after a strenuous social engagement, long after any self-respecting public transport has retired, for the night. We all remember him for his cheery parties when we suffer from exam depression at the end of the year. He appears rather slim, but has proved his weight lifting ability by picking his partner up in his arms and waltzing sedately on (his unconcerned expression being betrayed by the deepening red of his face). Being free to do as he pleases next year, Henry can be assured of a bright future in any occupation where ethics count for anything.

CORDES, D. O.-Started on a specialist career as a rat-catcher at the Auckland Zoo and he was so successful that he ran out of rats and had to graduate to Ruakura A.I. centre and thence to the Vet. School. Acclimatisation to Australian conditions was hastened when a dog carried off his tweed hat and now the only remaining tie with his home country is the purple hand-knitted one which he wears on all occasions. On racing days Don can only be approached by telephone if you have the money and know the number. Has recently been developing into an authority on grazing behaviour in cattle and on the economics of the marketing of punters' shirts. In his public career, he has been notable as a vice-pres. of the Society, Pres. of the N.Z. Vet. S.A., an editor of "Centaur," Fifth Year rep., and for his frantic attempts to develop the phantom rowing crew of 1956 into a more sub-stantial entity. You may find a pleasant nature if you can only penetrate the cold, hard exterior. Romantic affinities have been nebulous. Future: Club Practice but hopes to return eventually to the zoo. Perhaps we can expect a book on "Prob-lems associated with A.I. in Rodents."







**DANIELS, R. C. W.**—A very dark horse is "Black Dan" for his usual unobtrusiveness is dropped towards exam time when a few surreptitious credits and distinctions come his way. Wallaceville A.R.S. figures back in his past somewhere. Socially quite a guy, rather shy to begin, but generally ends up mauling his way amongst the females in attendance. Lyle has a reputation as a nutrition expert, claiming that he enjoys working out the complicated mathematical torture associated with it, "just for fun." The practical side of this nutrition has caused him to sample the nutrients at Phahlert's, Australia, Rex and the Marlborough, again, he claims, "just for fun." Lyle was pet boy in his Elizabeth Bay digs. His ability to handle landladies was of value in subduing one of the latter at a wild party and preventing her calling the police. Future: A little more nutrition combined with club practice in N.Z.

DIGBY, J. G .- John crashed in from North Auckland in 1953 and his Uni. life is bespattered with innumerable incidents. These range from climbing trees to being talked into jackerooing near Alice Springs. The "whip" of the Clovelly trio has done well in the course, and we bet "London to a brick on" that he will survive in the Graduation Stakes this year. His activities were seriously curtailed when his fiancee arrived from New Zealand. Included amongst his hobbies is (1) an astute knowledge of every horse that has raced in Australasia during the last half century, (2) collecting cauliflowers, (3) breaking glasses of beer with a quick flick of the elbow or tossing them through a window, and so on ad infinitum. He has been seen sitting on the roof of a utility, brandishing a broom in an attempt to emulate Van Tromp, and has been noticed to favour P.R.'s on the farm herd as the best way of keeping warm in the early hours of the morning. He has proved his capacity for responsibility when he was Secretary of the Society in 1955. Future occupation is in Club Practice; then after that who knows-anything from camels in the Sahara to llamas in Chile, but probably racehorses in Australia.

DOBSON, K. J .- "Stoker" Dobson does not mind calling an old classmate "Sir." But for a protracted illness Kev. would have finished the course before many of us began. He returned last year and scored with credit in bacteriology. "The drinker of the Northern Tablelands" occasionally advocates living only for the present, probably because all thought of any other time is completely dissolved away. Capable of considerable depth of thought, especially on other people's characters he was once heard to remark "this chap is a good lecturer-I was drinking p . . . with him in the pub last Friday." He is favourably disposed towards females with or without Jaguars and towards increasing the electric train services to Turramurra on Friday nights. To further his interests he is staying in Sydney this summer. At cards Kev, has developed 500 to a game involving applied mathematics and bases his immaculatedefence at table tennis on the principles of physics. A conscientious disposition ensures Kevin a bright future in N.Z. club practice or, wherever else he lodges himself,







ELLIS, I. G .- Jan, the diminutive member of the Clovelly trio, we all believe had considerable preveterinary experience as a tractor driver and apiarist in Auckland and the Bay of Plenty. Having come to Australia intending to immerse himself in the course, he gave slightly more of his time to playing football, and as half-back was seen with the Uni. First XV and ascending to greater heights still, the Faculty team. He has taken a keen interest in all Faculty affairs, having been a vicepresident of the Society and a president of the Sports Club. His hobbies include reading newspapers at any time, in any place, Tooth's (or any other brand) and digging drains. He was once cannonballed through the P.A. fence under the stress of battle. Xmas 1954-55 was spent between night clubs and the S.C.G. Highlight in his academic career was an entry into a zootechny viva with a lipstick-smeared collar. He fell heavily for a beautiful blonde, whose presence seemed to have sedating effect. Future: Mapped out by Leslie Inc., but eventual aim is private practice somewhere in Australia.

FERGUSON, Miss D .- Del, or rather "Dolores, if you please," is a Sydney girl with a capacity, found so rarely in women, of descending into great pools of silence, but who is nevertheless destined to become the country's most outstanding specialist in Piscine Veterinary Medicine. She believes ardently in the soothing effects of "fish gazing" during long periods of swot, and is most emphatic in recommending "Fishdin" as an all-powerful nutritive panacea for fish. At every party she goes to she seems to inevitably end up surrounded by a con-siderable number of males and as far as escorts home are concerned, she evidently subscribes to the theory that there is safety in numbers. Del will be remembered by the males of her year for her after-exam parties, her ability to appear beautiful on all occasions and perhaps most of all, for her success in retaining her femininity even after five years with the rest of us. Future: Seems determined to get to Queensland and her future is probably concerned with horses, cattle, fishes and children.

GARDINER, D. E .- "The Lord" is the electrical genius of the year. He has provided the lighting at most of the Vet. do's (and don'ts), and will even get lit himself if the red stuff is sufficiently overproof. Earl came to us from Massey College, managed to do Second Year in just over two terms and to become an authority on the anatomy of the horse in one month. He received his early training at Kings Cross, and was once delivered f.o.b. Elizabeth Bay after being "found" in Paddington. Claiming that exams can be successfully inter-spersed with visits to Phahlerts, he proved it with a Distinction in pathology. He has received considerable experience (a) in small animal practice, and (b) in telling off old ladies in the clinic. Earl has great tales to tell (in the wrong company) of 1955 Revue. Often was he seen bleary eyed at morning lectures, the result of night-long work with the arty Film Society. The interpretation of "work" is an open question. Your future is with large animals, Earle? "My bloody oath it is!"

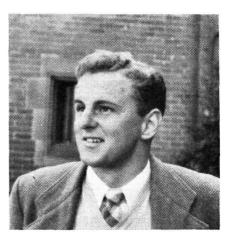




HART, I. H.-A product of Victoria, the "Sol" arrived in Sydney in 1953 as a nice, quiet, curlyhaired "blonde" and continued to live a sober, hard working existence for about eight months. Since then the degeneration to his present condition has been both rapid and remarkable. His name has become a legend within the precincts both of Prince Alfred Hospital and St. Paul's College. His prowess on the football field has won him an Australian Rules blue and representation with N.S.W. He was voted one of the noisiest occupants of St. Paul's and this, combined with his famous open night parties, led to him being asked to leave in 1955. He followed this closely by clashing with every respectable landlady-once more to be thrown out in the cold. His form after the Fourth Year exams brought forth much admiration. Unfortunately his escapade came to a sudden end with an acute attack of the old saying "never again." His future lies somewhere along the Murray River, where his fine torso and curly hair will continue to bring him fame.

ELLIOT, R. E. W.—"Floppy" has achieved notoriety as editor of "Centaur," Publicity Officer and Society Treasurer. He has played football each year-minus teeth and sometimes boots-as the gruesome fiveeighth. Till Fourth Year he did not know the difference between a gram and a grain and his experimental attitude towards pharmacology has landed him in trouble with opium and caffeine. Other interests include pushing motor bikes around Sydney, taking blondes to posh pubs, rowing, judo, jazz, jive and occasionally, Vet. Science. Regards bones as objects on which to beat out hot rhythms and can usually be found at the "Con," listening to a jazz concert or, at home practising on his guitar, piano or drums. Has always given generously of his time to any of his fellow students needing marriage guidance, and will tell you it's a dead loss making love to a tape recorder. Royce has a tendancy to distort scientific facts by philosophical and psychological abstractions. He is still recovering from his fiancee's recent visit to Australia, which accounts for his recent absence from early morning lectures. What are the New Zealand farmers going to say about "flopping bovine psychoanalysis?"

HAYDON, Miss N. A.-Coming to us from Terang. in Victoria, Anne is one of the female trio which has kept the males of Fifth Year in touch with the workings of the feminine mind. She can seldom be seen during the lunch hours as, she usually manages to retire unobtrusively to No. 2 Oval with a "drop of Scotch." Anne can always be relied upon to turn out for a game of hockey-here she always proves adept at sciatic swipes with her stick, but nevertheless, due no doubt to her early training at Merton Hall, manages to maintain an innocent expression throughout. Early in the course she moved into a penthouse with Russ in Carillion Avenue, and her wild parties bid fair to rival the Duke of Kent's for newspaper space. Sunny Queensland and its large animal population is very attractive to Anne.



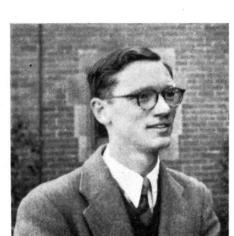




HORE, D. E.-Des spent First Year in Melbourne where he proved to have quite a photogenic profile, especially when wrapped around a boxing glove. He arrived quietly on the scene in '53 and took up residence in Wesley College. "Slugger's" eves have been known to disappear into the back of his head for weeks on end especially near examination time. He has a propensity for missing breakfast and as he will often inform you, subsists on two paltry meals a day. During his past four years he has made a thoroughly beaten track between Wesley and P.A. nurses and was once seen on one such jaunt between lectures. He has provided a considerable amount of unwilling ballast for both the Vet. and Wesley eights. By dint of hard work and no sleep he has avoided any repeat encounters with the examiners. Des is a born department man, as much of his stationery and equipment proves. His future lies at least temporarily in this direction.

**IRVING, D. U. H.**—Dave's past and most of his present for that matter, seems obscured by a veil of mystery, a fortunate quality, evident when one reads the notes on the rest of the final year. He is very attached to his pipe and to "champion female 1954." His eagerness to debate has led him to be our representative in the S.R.C. where he used to enjoy a "quick parry of swords" across the table with the arty types. One such dealing with the relative merits of grazing pink elephants in the quad, which project collapsed owing to all elephants of that colour being in use at the time. With his benign indifference to sartorial elegance he will doubtless be found in private practice.

LEANING, W. H. D.-Bill used to be called "the bodgie boy" till the current fashions caught up with his way of dress. Since he left Tauranga, N.Z., he has spent his idle (?) moments doing veterinary science and amassing a great pile of text books. Most of his time has been spent taking colour photographs, collecting great heaps of weeds and "the landlady's daughter." Bill is a follower of the school of left-handed caricature but, finds that it does not pay dividends on the tennis court. However, the same left hand has (1) provided many posters advertising student functions (2) has wielded a scalpel to effect in the surgery examinations and (3) lifted easily (but not too often) a full pint-sized mug. Future: If he doesn't find a career as a singer, artist, male model, photographer, a bright future is assured him in Veterinary profession,



LYNCH, J. J.—In "Jus" we have one of those boys with the apalling habit of attending all lectures, and of obtaining a string of credit passes each November. Prior to getting engaged he could often be observed hard at work on the last train to Eastwood. He has since forsaken trains for a Jaguar, but has found that even this has its disadvantages, e.g., explaining to his father how a pair of ear-rings found their way on to the back seat. Occasionally seen on the cricket field waving his right arm in a manner somewhat similar to bowling-use of the same motion on the hockey field ensured that his first appearance was also his last. He entered public life as a member of the Dinner Committee in 1955, but retired again when the losses were added up. Justin believes speying operations should not be hurried and advocates an exploratory laparotomy before the actual ovariectomy. Future: Both Mar-garet and intending employers should be wary of that innocent smile.

MANUSU, P.-Some years ago Perry came from Mindoorin and since then has spent most of his time in the precincts of either P.A. or C.I.R.O., reaching the zenith of his checkered career with an inmate of the Women's College. By wearing a white coat over to K.G.V. he managed to pass for an honorary and we believe he has received considerable extra mural tuition in obstetrics as he has in parasites and surgery with a couple of old mates, Hughie and Fred. With his photo taken at yacht club functions, in the Sunday papers he has hit the social life of Sydney almost as hard as he has on odd occasions hit the grog. During the time he was in charge of the Book Scheme he did a marathon job, it being noticeable that year that the financial loss was less than usual. His Mohican haircut will probably accompany him into private practice.

MOGENSEN, Miss R. H .- Russ does not hesitate to voice her disapproval of pigs, especially of the animal variety and was once known to take the matter as far as the senate. She will be remembered for her peculiar chin-on-book and arms-hanging posture when attending afternoon lectures in the Stewart. Perhaps such an attitude is one of intense concentration, for she has managed quite a string of Credits and Distinctions. Any student committee on which she has served seemed to profit from her presence for she has a flair for arranging balls and dinners. Twice she has been elected (?) Year Rep. and has directed our affairs with her own qualities of leadership, and where necessary, of charm. Russ has a delightful choice of ear-rings. One set, which were obviously inspired by Mel-bourne's Moomba week, succeeded in partially distracting male students during surgery dems. Having taken a keen interest in all social and sporting events, she has shown herself equally adept at both tennis and the can-can. Large animal practice in Queensland holds her fascination, as does a trip to Europe and a post-graduate course in America.



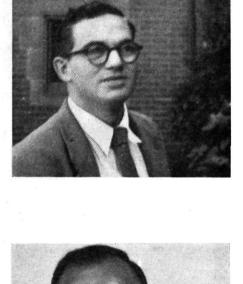




MURRAY, J. E.-Hailing from University of Otago. Jim has imported and managed to retain (1) the Otago accent (2) Scottish economic insight. However he is generous to a fault and would loan you the coat off his back if need be. He likes to live handy to Harold Park to keep the bookies on the bread line, so we all believe, but he keeps those escapades in the dark. He is the only genuine Scottish violinist in the Faculty and has a marked tendancy to waltz with male partners at the Vet. Dinners. In the clinic he developed the personal approach well, consulting the majority of his clients al fresco. He evidently has a fund of parlour stories to keep those horse owners amused all morning. An individualist in no small degree, Jim has a keen sense of competition at the annual examinations and should do well in club or horse practice in New Zealand or in the barber's trade.

NEWLANDS, R .- Ron has never told us how he came to be called "Cactus" but we suspect that it has something to do with his early Faculty life. He has concentrated on the more obscure side of veterinary science, astounding us with such informative tit-bits as the gestation period of the Chilean ant-eater, and the colour of an Afgan camel's corpus lutem. Cactus has an unorthodox approach to surgery demonstrations, and has been known to observe equine chloroform anaesthesia with his feet sticking out from the top of a hedge. But then he claims that there is more to surgery than commonsense, and a higher truth than fact. In his day a sportsman of no mean degree on the hockey field or bush walking. Ron has since found most of his recreation in social functions, having first proivded himself with the necessary equipment, i.e., a car—the rest comes easily. When Ron and the State Public Service have finished with each other he intends (1) to further his cultural activities and (2) if time permits, to establish a vet. practice.

NIEUWLAND, F.-Known better, for some reason, under the alias of "Willy," Folkert hails originally from Holland and has reached Australia via Indonesia and New Zealand. With a capacity for getting his photo in the newspaper his geographical progress has been accompanied by pen pictures in the local press of each place he has visited. During the war he was a lieutenant in the Dutch Army and though his length of leg was of value to him when running away from the Japs., his height was a distinct disadvantage when they were shooting at him. Arriving in N.Z. in 1950, he worked in a Taranaki cheese factory long enough to (a) earn a vet. bursary and (b) convince the boss' daughter that he was a good guy. In 1954 he broke his course to have a year's fling on the Continent, where he was joined by Shirley (yes, the boss' daughter). He gained valuable experience at the vet. school at Utrech and capped the lot by getting married in 1955, whence he retired to a garage in Hornsby to finish the course. Future: Club practice in N.Z. and no doubt his photo in the local press.



68

QUINLIVAN, T. D.—T. D., the hefty member of the Clovelly trio, who if you per chance can't see him you can hear him, especially on the ballroom floor; if you can't persuade him to sing (doubtful), he will certainly perform you a haka (usually unsolicited). T.D. came to us from Haumoana, Hawkes Bay, and has dashed back to N.Z. at every available opportunity with one objective-to win and to woo a brunette. Wedding bells will ring for Dave and Audrey next February. Brutally unorthodox as chairman of the N.Z. Vet. Students' Association he managed to hold office for three years by the simple expedient of failing to hold the annual elections. Being passionately fond of football he was captain of the Vet. XV in 1955. He has been a v.-p. of the Society. Not the least of his worries are the number of credits the examiners burden him with every year, however, he is "more or less right." His immediate future is in club practice; subsequently success will accompany him into private practice.

ROBINSON, R. C .-- Rob originated in Bendigo, Victoria, and was thus penalised with a year at Melbourne University before being allowed to proceed to Sydney. Was a hot drummer in a jazz band before he left Melbourne and if you get him talking about Louis Armstrong you won't get away before he's talked you right back to Storyville. Has played Aussie Rules for the Uni. and can be relied upon to turn out for any Fifth Year versus-everybody-sporting-activities. Was beginning to show great promise as a golfer until he married in 1954. The connubial state has so agreed with him, however, that he has since been forced to buy longer handles for his golf clubs as his waistline pushes him further away from the ball. His nocturnal runs around Ashfield are suspected to have some connection with his growing concern over his waistline expansion. Future: Will probably end up as a Capitalistic rabbit breeder as he maintains these animals the most efficient converters of feed.

ROPHIA, R. T.-"Pincher" was chased out of "Prong-(er)-how" in 1953, he sailed to Sydney where he took up residence at Ernies and slept at St. Paul's College. His first encounter with K.B. Tooth resulted in a rodeo, during which he failed to subdue his bed. Renowned for his tall stories, which, though not lacking in imagination, he made them become somewhat monotonous by repeated repetition. During a period of three years he has: Pinched a college maid's "derriere," been chased by a University policeman with a gun, pole vaulted over the oval gate with a banjo on his back and a rug under his arm, seranaded the Dyke on many occasions and has proved that the course of true love is not hampered by a broken leg and arm. Ray was tossed out of college and a respectable boarding house early in Fifth Year but, since the arrival of his better half from N.Z. has been living permanently in the "dog house." His carrer will be one well worth following in N.Z. Truth,







**RYAN, B.**—"Mickey" started his public career in Third Year as a member of the Float Committee which questioned the medicos' rights to operate on lions. Has since given up worrying about matters of ethics and has been devoting himself whole-heartedly to the consummation of life. He shows an absorbing interest in all girls in general and C.S.I.R.O. girls in particular, quote: "There was a nice little chick down there this morning be gee" unquote, considers ankle conformation the most important factor in phenotypic selection. E.coli has been known, however, to dampen his ardour in sporting and in other fields. Coming originally from Melbourne he is another Uni. Aussie Rules player. His academic career has been featured with credits and distinctions and such comments as "say fellas, let's do something constructive." Future: Barry wants to begin practice in Tasmania because he doesn't want to settle there.

SMITH, I. D.-Ian has been seen at a few lectures in the last five years. He seems to favour a seden-tary mode of life, characterised by a somnolent attitude during the day and relapsing into a coma at night. Often he has been known to camp on that part of the Oval next to the P.A. fence, taking with him blankets, torch, drinks and mosquito repellant. His motives are suspect. His consumption of liquor in the last three years has bordered on the phenomenal and if alcohol is anything of the preservative it is cracked up to be, those intramuscular injections should keep him alive till well over a hundred. His astuteness of mind has enabled him to take over a genetics lecture and to translate Lush to his fellow students. It has also enabled him to be the only person to pass every year by leaving the year's swot to the week before posts. His future will probably be concerned with further self-experimentation investigating the effects of estrogens on the libido of the birds with which he takes all the prizes at the Royal.

WILSON, D .- Having his origin in Dungog, Dave found it advisable to leave and ended up in Scot's College where he obtained quite a reputation as something of a rower. He became quite adicted to the Army during his sojourn in the C.M.F. and it was there that he found that a pig could help to keep his bed warm on cold nights. He is remarkable in the Faculty in that he cannot be tempted by the amber fluid and prefers to leave functions sober-knowing his feelings for the opposite sex, however, one is apt to view these early departures with suspicion. Dave is often seen to drive one of those cars which stop and back up every time they see a pretty face and this probably accounts for his absence from most Fifth Year lectures. At times he has been known to attempt to recline in surgery lectures with all manner of literature but, finding concentration difficult, had to finish the book outside. He has not told us much of his plans for the future, but we would not be at all surprised if he is very successful.





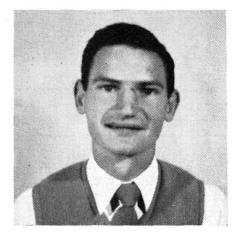


WILLSON, R. L.-This potential heap of gas with a strong merino covering filled his lungs with the clean air of Kangaroo Island and took off under posterior pressure to Sydney via Adelaide, talking all the way. He talked himself to the heights of an Aussie Rules blue and to the depths of R.P.A. By the same means he became President of the Society and a member of Fifth Year. He even talked a poor young thing into an engagement, thus achieving the ultimate in furthering staffstudent relationships and all this in the space of five years. "Hairs" extra-oratory hours are spent at no pub in particular, he likes to sample them all. He has also given generously of his hours as a guinea pig for Dr. Richardson's study on Leptospirosis in the male. With his special ability in the conference room, Dick should be an asset to the South Australian Department of Agriculture. Good luck, Dot and Dick.



WILKINSON, F .- Fred, so we all discover comes from Perth and yet still maintains he is an Australian. He is as reticent about his early life as he is voluable about his prowess with the neddies; yet when it comes to fillies, he is a dark horse. He has been known to favour a pleasant day at Warwick Farm to a solid morning's note taking. Cricket and Rules have also featured in his public sporting life; then later he condescended to play Rugby, mortifying the New Zealanders by becoming the best full-back in the Faculty. His suave appearance and love of the surgery department should assure Fred an honoured place in Western Australia. He wants to own a station; anyway his broad grin (stopped only by his ears) can do nothing but help him to success.

WILLET, M. J. D .- Max took a degree in agriculture in Holland and on arriving in New Zealand thought he would add another, this time in Veterinary Science. His hobbies include: Goldfish, swearing in Dutch, rolling other people's tobacco into as compact a mass as possible, extraterrestial German translations and running along behind trams. He recently rid himself of his motor bike in favour of riding on trams and buses, claiming it does not cost him anything that way. His career was highlighted by his waking everyone up in a bacto. lecture when he fell asleep and sent all the books crashing to the floor. He is an ardent student of biometry, revelling in "sources of variance," while other students are "deviated" in other directions. His "Oo-la-la" of riding school days will probably accompany him into club practice. Future: Ah, Mr. Mandy's arrived-now everything will be all right.





## M. MALONEY

#### **GRAIN AND PRODUCE MERCHANTS**

#### $\star$

#### 185 SUSSEX STREET, SYDNEY

Phones: BX 6448-9

With the Compliments of-

#### W. CALNAN PTY. LTD.

k

LIVESTOCK SHIPPING AND FORWARDING AGENTS

Horse and Cattle Float Proprietors

SYDNEY

Phone BA 4201

Private: FJ 2759

By Courtesy of . . .

#### The LALLAH ROOKH

#### HOTEL

(Mrs. Elsie Armstrong)

#### \*

CITY ROAD

DARLINGTON

MX 2922

G LA X O

## is inseparably linked with PENICILLIN & STREPTOMYCIN

The Glaxo presentations of these two antibiotics are completely manufactured in Australia and include the following veterinary products:—

Vetspen Cerate Vetspen Ration Dihydrostreptomycin Cerate

the name of

Vetspen Hypodermic Streptopen Cerate Streptomycin Oral Solution

Vetspen Suspension Streptopen Uterine Tablets

#### **Robert Lundie**

#### CUSTOMS, SHIPPING AND INSURANCE AGENT

COSTING EXPERTS — Specialists in Heavy Transport Anywhere

#### **26 BRIDGE STREET, SYDNEY**

BU 1019

BU 6114

Board your Pet Dog or Cat happily and safely at the new, modern and beautiful Kennels at-

#### BLUE CROSS BOARDING KENNELS MONA VALE ROAD, ST. IVES - - - JJ 2631

We are also the Agents for the famous A.B.C. DOG & CAT REMEDIES. We have a remedy for every ailment. Country inquiries are welcomed. Just write or phone

A.B.C. DOG & CAT REMEDIES, ST. IVES-JJ 2631.

CENTAUR						
ABORATORIES LTD.						
S, VETERINARY MEDICINES JRAL CHEMICALS						
MULGOA ROAD LIVERPOOL						
Telephone UB 8568						
·····						
By Courtesy of—						
Crystal Clothing Industries Ltd.						
★ SHIRT MANUFACTURERS						
*						
677 CANTERBURY ROAD BELMORE UW 3427						
City Office:						
Cnr. KING & KENT STS.						

"We are pleased to offer the co-operation of our laboratory and facilities to bonafide workers in the field of animal nutrition."

"Farm-Tested" Stockfeeds

#### Crago Stockfeeds Pty. Ltd.

#### P.O. BOX 19, NEWTOWN

Phone LA 2864

THE MEAT AND ALLIED TRADES FEDERATION OF AUSTRALIA

35 Pitt Street, Sydney — BU 6941

#### ΜΕΑΤ

has been the Leading Food of Man since earliest times.

It is the centre of a balanced meal. Supplies energy for work and play. It is always available and always in season.



#### FOR QUALITY FOOTWEAR

The Most Popular Service in the District

Telephone: UW 3183

75

For all classes of

Insurance

#### You'll

#### be on good terms with

THE

### NORTHERN ASSURANCE

COMPANY LIMITED Incorporated in England

Specialists in Livestock Insurance

Communications to Box 2612, G.P.O., Sydney.

CONGRATULATIONS . . . for a job well done.

 $\star$ 

#### **INGHAM'S**

THE LARGEST CHICK BREEDER IN THE STATE

Renowned for Quality over the past 34 years.

★

KURRAJONG ROAD, CASULA P.O. Box 4, Liverpool - UB 8067

#### SPECIAL EASY TERMS

and

#### LOW DEPOSITS

For Graduates and Undergraduates on New Ford Cars and Used Cars of all makes at

#### FRANK DELANDRO PTY. LTD.

Authorised



A1-A9 PACIFIC HIGHWAY NORTH SYDNEY Phone: XB 4066 "See Frank for your Ford" With the Compliments of . . .

#### The Kurrajong Hotel

SWANSON ST., ERSKINEVILLE

.

For your supplies of RESCH'S BEER

\*

Phone LA 1452



**F**ROM year to year, N.S.W. Woolgrowers and Stockowners sell more through the "F & G" than any other stock and station agents. During the 1955/56 season, "F & G" again topped all stock selling agents at Homebush, by selling 200,037 sheep and established an all-time record by selling 250,834 bales of wool.

It pays dividends . . .

when you co-operate with the Great Country Organisation

#### THE FARMERS & GRAZIERS' CO-OPERATIVE GRAIN INSURANCE AND AGENCY CO. LTD.

Sirius House, Macquarie Place, Sydney.

Telephone: BU 3311.

77

#### EGGINS FOSTER SEEDS

Eggins Foster's are specialists in all Agricultural, Flower and Vegetable Seeds and handle only re-machined high testing and pure strains.

Write for a copy of our Monthly Price List . . . It is FREE and Post Free.

Note New Address:

Eggins Foster Pty. Limited Cnr. Phillip and Young Streets Waterloo (P.O. Box 66, Waterloo.)

Phone: MX 4906

Telegrams: "SUSSEX," Sydney.

With the Compliments of

#### Bill Doab

at the

#### FOREST LODGE HOTEL

117 ARUNDEL STREET

FOREST LODGE

MW 1872

# The Brightest Station on the Air 2 KY

#### Maroubra Bay Hotel

MARINE PARADE, MAROUBRA

#### First-class Accommodation

Bus route 399 at door. Hot and Cold water each room. Eight rooms with Private Balcony overlooking beach. £8/15/-, Bed and Breakfast, weekly. £12/12/-, Full Board, weekly.

**Proprietor:** Paul Byers

Phone FJ 1048

Small Carcases and all organs completely destroyed with a

PATENT

### DESTRUCTOR

Solve the problem of disposing of small carcases and body organs with a patent GARBAGE DESTRUCTOR. Hearts, livers, bones, etc., are speedily reduced to a fine white ash, and the unit is self-emptying.

#### ALSO GARBAGE-WET OR DRY

Sodden scraps, freshlycut grass, wet leaves, etc.—all are destroyed in the DESTRUCTOR.

Write or phone today for full particulars-N.S.W. PRODUCE CO. PTY. LTD. 181 Clarence Street, Sydney. BX 4756 Showrooms at 21 Phillip Street, Parramatta. YL 6436

CENTAU	к
--------	---

## N.S.W. NATIONAL COURSING ASSOCIATION GREYHOUND RACING

 $\star$ 

#### WENTWORTH PARK

#### FIXTURES - 1956

August .	 	 	18	November		 	 10
September	 	 	12	November		 	 21
September	 	 	22	December	• •	 	 1
September	 	 	<b>29</b>	December		 	 15
October	 	 	17	December		 	 26
October	 	 	<b>27</b>				

"Where the Stars Race under the Stars"

With the Compliments of-

#### J. LUKINS & SONS

Tobacco Merchants

PETERSHAM

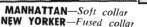
LM 4232

#### Australia's smartest white shirts are PARAMOUNT !



BOSTON—Soft collar WINDSOR—Fused collar









MILANO—Convertible as a business shirt

MILANO—Convertible as a sports shirt



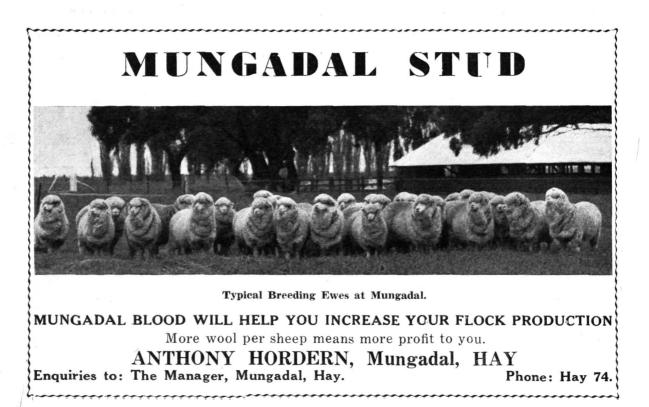
## **BLUE RIBBON TESTED SEEDS**

You will always be sure of agricultural seeds of the highest test and best strains from Wright Stephenson & Co. Limited. Their world-wide purchasing — from branches throughout New Zealand and in London — brings you the highest quality available, especially in New Zealand seeds, including lawn grasses and garden peas.

## WRIGHT STEPHENSON & CO. LIMITED

(Inc. in New Zealand)

WHOLESALE SEED MERCHANTS 34 QUEEN STREET, MELBOURNE - - - MB 3281 Sydney Branch: 580 BOTANY ROAD, ALEXANDRIA. MU 3905



## **THE VICTOR**

The Simplest and Best Sheep Drenching Gun in the World is made by

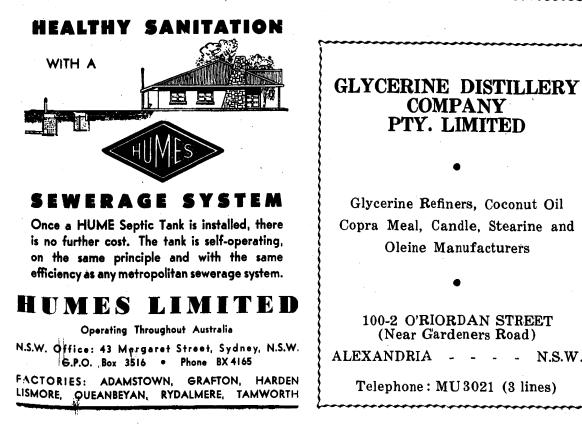
## C. V. ROBERTS

**40 CHARD ROAD** BROOKVALE

XW 6931

XW 6931

N.S.W.



WITH COMPLIMENTS AND BEST WISHES

from

H. D. Crompton & Sons Pty. Ltd.

19 Conder Street, Burwood

UJ 2841

With the Compliments of

**Oliver Food Products** 

Pty. Ltd.

to the Faculty

67 Railway Parade Marrickville

LA 1414

LA 1414

The New South Wales Trotting Club Limited

(At Harold Park – Glebe)

#### - 1956 -

7 Races.		First Race, 7.25 p.m.
Saturday	•	29th December
Friday .	•	14th December
Saturday .		. 8th December
Friday .		30th November
Saturday	•	17th November
Friday .	•	9th November
Friday .	•	2nd November
Friday .		. 26th October
Saturday		. 20th October
Saturday .	•	. 13th October
Friday .	•	. 5th October

Admission Charges PADDOCK: Gents, 10/-; Ladies, 5/-. LEDGER: Gents, 4/-; Ladies, 2/-.

> B. L. STRANGER, Acting Secretary.



Sponsored by . . .

#### SHELLEY & SONS CORDIAL FACTORY PTY. LTD.

Specialising in the Manufacture of: Aerated Water - Cordials Orange Delite - Lemon Delite Grapefruit Delite - Lemonade - Koala Lime and Soda - Ginger Ale, etc.

MURRAY STREET, MARRICKVILLE

Phones: LA 5461 (4 lines) WISHING THE FACULTY AND THE CLASS OF 1956 EVERY SUCCESS

#### The JUNCTION HOTEL

(Mrs. Porra)

★

**98 CITY RD., DARLINGTON** 

MX 3025

MX 3025

## THE SHOWPLACES OF AUSTRALIAN RACING

#### THE AUSTRALIAN JOCKEY CLUB'S UP-TO-DATE AND COMFORTABLE RACECOURSES

#### World Famous RANDWICK

#### WARWICK FARM

3 miles from the Heart of the City. Australia's most modern and bestappointed Racecourse, set in delightful surroundings on the Hume Highway, near Liverpool.

FOR PARTICULARS OF RACE MEETINGS SEE DAILY PRESS NOTICES

> W. N. PARRY-OKEDEN, Secretary.
> 6 Bligh Street, Sydney.

By Courtesy of . . . The Marlborough Hotel (E. Richardson) \* 145 King Street, Newtown \* LA 1348 BLOOD BANK

They Cut Down Losses Minimiae Minimiae Fly Strike Prevent Set Back

## What More Could They Do?

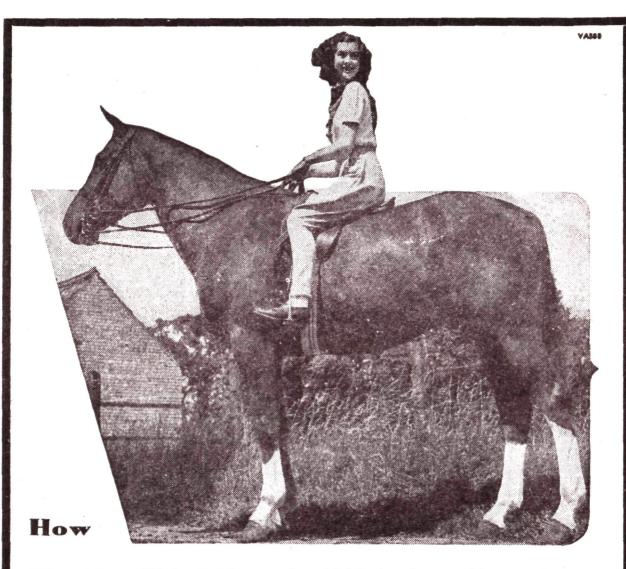
"No Losses"... "Losses Nil"... "Have never had a lamb blown by flies since using 'Elastrator'"... "Flies very bad but not one lamb was struck"... "Lambs have no set-back" ... "No set-back and there were no losses"... "No blowfly worries or loss of condition."

These are extracts from hundreds of testimonials from users of "Elastrator" Rubber Rings for marking and tailing lambs and castrating calves. The "Elastrator" method is now in use on most large stations throughout the Commonwealth. The "Elastrator" way is the bloodless way . . the humane way . . . the time-saving way.

Instrument £6-6-0 Rings 500 - 30/-Loader £5-5-0

## ELASTRATOR

(Regd. Trade Mark)



many

hands?...

This is not only a question of height, but also one of human endeavour, a contemplation of the generations of experience in animal breeding and husbandry which have been devoted to the development of modern pedigree stock.
And how much human endeavour is embodied in each M&B brand Veterinary Product? Within the May & Baker organization the hands of the research chemist, the biologist, the clinician, and the chemical engineer are coordinated to ensure that these well-known preparations maintain their reputation as undoubted leaders in their field.

## &B\_\_\_\_VETERINARY PRODUCTS

MANUFACTURED BY MAY & BAKER LTD

Distributors: MAY & BAKER (AUSTRALIA) PTY LTD - 5 PHILLIP STREET - SYDNEY - TEL: BU 3621 (3 LINES) 266 LYGON STREET - CARLTON NS - VICTORIA - TEL: FI 57:50