Those who receive the mantle of a rich and noble heritage are expected to perpetuate it.

For those who wear such a mantle and give it no sustenance it becomes but an empty echo out of the past. - WLS
The PROCEEDINGS of the

MEDICAL COLLEGE OF GEORGIA
Augusta, Georgia

Vol. 3
JANUARY, 1958
No. 1

Published quarterly by the Faculty of the Medical College of Georgia

Editor
W. L. Shepeard, M. D.

Associate Editors
Robert B. Greenblatt, M. D., J. Fred Denton, Ph. D., Harry B. O'Rear M. D.

Managing Editor
Mary P. Hallinan, B. S.

Art Editor
Orville A. Parkes

Business Manager
Thomas N. Dwyer, B. B. A., L.L. B.

Subscription rate........................................................................................................$2.00 per year
EDITORIAL

Deserving of comment in this issue are the events leading up to the painting of the portrait of Dr. Pund, which now hangs in the Library. Dr. Bleakley Chandler, '48, first spoke to this editor concerning the matter of a portrait of Dr. Pund to hang along side of those of Drs. Sydenstricker and Kelly. This suggestion was greeted with encouragement and was thought to be quite apropos, particularly since Dr. Pund had played such an important part with Drs. Sydenstricker and Kelly in keeping the school open in 1934. A memorandum was sent to Dr. Kelly concerning this idea and he thought it desirable. He then asked me to compose a letter soliciting the necessary funds for such a portrait. A letter was formulated and sent to those people whom Dr. Pund had served, over the years, by doing their tissue work for them. It was thought best to send this letter to only this particular group, because they were the ones most indebted to Dr. Pund, for it is a well known fact that the fees which he charges are minimal. Miss Juanita Sirmans, secretary to Dr. Pund, aided in making up the mailing list of the doctors served and assisted in distributing the letter printed below:

March 8, 1951

Dear Doctor:

As you probably know, paintings of G. Lombard Kelly and V. P. Sydenstricker hang in the library of the Medical School. I understand the cost of these two portraits was derived from donations. No doubt Dr. G. Lombard Kelly, Dr. V. P. Sydenstricker and Dr. E. R. Pund were the key men who kept this school alive at one time. Dr. Pund has given years of devotion and hard work to the school and his profession. He has rendered diagnostic tissue service to surgeons at an extremely low fee over the years. The service to the school, community and surgeons has been out of proportion to his income.

Recently, Colonel Ash, who knows more professors of pathology more intimately than almost anyone else in the country and who is honored, revered, and respected by all pathologists, stated that he considered Dr. Pund the most outstanding professor of pathology in the country today.

Since surgeons have more occasions to use his services than any other men in medicine, it has been suggested that they contribute funds toward a painting of Dr. Pund to be hung in the medical library.
of the school. This would be a fine gesture on the part of those who have used his time and knowledge so freely. It is estimated that the cost of such a painting would be within $800.00 to $1000.00. There are no state funds for such a project and funds would have to come entirely from contributions. We would like to know what you think of such a project and what you would like to contribute? Five to ten dollars donations from you would be a big help.

If funds in excess of the needs for the project are obtained, they would be put into Dr. Kelly's "Discretionary Fund" from which he is able to finance odds and ends around the Medical School for which no state funds are appropriated. Also, from this fund, Dr. Kelly takes care of a few old employees who have given years of service to the school and are now unable to work.

If you care to contribute, send your check made out to the Dr. Pund Fund, to Miss Martha Dreyer, care of the Business Office, Medical College of Georgia.

Sincerely,

s/Walter L. Shepeard, M. D.
Professor of Medicine
In charge of Clinical Pathology

WLS/hv

Through these letters, $485.00 was raised. The portrait was painted by Mr. Gerald Foster of Beech Island, at a cost of $450.00. Mrs. Pund selected the frame. After the portrait was hung, there was $34.80 left from the donated funds. This amount was turned over to Dr. Pund in order to clear out the "Pund Fund" monies from the bank. He then donated this balance to the school to purchase brass name plates for the remaining unlabeled portraits in the school.

Thus, with the addition of Dr. Pund's portrait to the collection already in the library, students and visitors alike, may now view the likenesses of the "Four Horsemen" of the Medical College of Georgia in the twentieth century. With Kelly, Welch, Osler and Halsted of Johns Hopkins, we can name Kelly, Sydenstricker, Pund and Sherman of Georgia.
Another item of interest in this issue is the article by Dr. Ovid B. Bush, '47, concerning his experiences as a medical missionary in Korea. Dr. and Mrs. Bush left the states in July 1949 and arrived in Korea in September of that year. They had taken all their furniture and household belongings with them, but these were not unpacked on arrival because they had to stay with some other missionaries for the first few months. During this time, a new home was being built for them, but before it was ready for occupancy, they had to evacuate from Korea because of the outbreak of the war and as a result all their belongings were lost. During this time Mrs. Bush worked as a laboratory technician. Then in November 1949, their first child was born. In June 1950, the men took the women and children to Pusan, a coastal city, and put them on a boat for Japan. Then the men—two of them missionary doctors, Ovid Bush and Paul Crane—were employed by the Army in Pusan to give medical service until the army doctors arrived. When they were released from this service with the Army, they returned to Chunju—their mission station—but had to evacuate soon thereafter because the Reds were advancing. This time, the men went to Japan for an interim of about three months, or until September 1950. When Ovid arrived he found Mrs. Bush critically ill with what was subsequently diagnosed as polio, but fortunately was only a mild case of the bulbar form. While in Japan, Ovid was employed as a civilian doctor at Osaka General Hospital.

After the Reds were pushed back, Dr. Bush returned to Chunju but Mrs. Bush remained in Japan. This separation period lasted from September 1950 until they left to return to the States in September 1952. However, during this time, Dr. Bush had a two weeks rest period every six months when he would fly to Japan to be with his family. Their second child, John, was born in Japan in May 1952.

In recognition for the work that Dr. Bush accomplished while he was a medical missionary in Korea, he was awarded a citation from the United Nations for outstanding service to the war refugees. (WLS)
Many portraits line the walls of the halls of the Medical College of Georgia. They are the faded likenesses of preceptors who served with distinction on the Faculty of the college in years gone by. In consonance with this tradition, several gentlemen of the Faculty—our present elder statesmen—have been honored and their portraits adorn the Library walls. Among these elder statesmen is Dr. Edgar R. Pund, who has held the chair of Pathology for some twenty years. He has served long and well. To most alumni, E. R. P. is an unforgettable symbol. Feared and revered, he is and will be remembered as a stern task-master, a harsh disciplinarian, who with Teutonic resolve set out to inculcate basic principles of pathology as a solid foundation for all the medical disciplines. The subject of pathology has long been regarded as one of the most difficult and deadly in the curriculum. Dr. Pund has veritably breathed life into this morbid subject and has so enlivened the teaching of pathology as to make it most palatable, acceptable and interesting to student and graduate alike.

Dr. Pund has earned the respect of all who have come in contact with him. Because of his love and devotion to the college, because he has offered guidance and advice to all who have sought it, because of his unselfish cooperation in matters of research with practically every department of the school, because he has brought honor and fame to this venerable institution, he richly deserves the accolade of the student body, the faculty and the alumni of the school, for it is they, in humble tribute, who have made possible this excellent portrait of one of its most notable sons. Future generations of medical students who will gaze at this protrait, will realize that the growth of the college must be attributed to men of his stature. They will look forward to posterity with inspiration because they will be able to look back to these great predecessors with pride. Dr. Pund has won his laurels—IL A GAGNE SES EPAULETS. (RBG)
DISSEMINATED LUPUS ERYTHEMATOSUS
By Zeb L. Burrell, Jr., M. D.

As a disease entity lupus erythematosus has become more important in the past few years because of the feasibility of treatment which may be of considerable aid to these patients formerly doomed to die with no form of effective therapy.

Whereas five years ago the positive diagnosis of lupus erythematosus was of academic interest only, it now becomes of real practical application. As in many diseases, the earlier the diagnosis is made, the more effective is the treatment. Although there is no means available at the present time for the permanent control of this condition, the steroid hormones have been demonstrated to alter the disease process sufficiently that they are frequently palliative and occasionally life saving.

For this reason it is important that the general practitioner and specialist alike recognize this state; and a simple, rapid confirmatory test would be invaluable. Such a test which is within the reach of any physician possessing a microscope is now available. This test is reported to be highly reliable, giving few false negative and no false positive reports. It will be the purpose of this paper to review a few of the features of this disease and to describe the method by which the diagnosis may be established.

Clinically lupus erythematosus is one of the more variable diseases. The triad of arthritis, nephritis and dermatitis should lead one to strongly suspect lupus, especially if this occurs in a young adult female. The dermatitis is described as erythematous, non-itching, discrete, scaly patches on the exposed surfaces such as cheek, chin, and forehead. The palms and soles may show thinning of marked degree. The skin lesions are adversely affected by exposure to sunlight. In addition to this triad there may be involvement of almost any system of the body. Polyserositis may be a significant factor. There may also be signs of central nervous system involvement with convulsions; however this is usually a late finding. The heart lesions are seldom functionally important; murmurs are rare and cardiac insufficiency usually a terminal finding.

The arthritis usually consists of swelling and stiffness of the larger joints with only moderate tenderness and little redness. The kidney lesions usually produce albuminuria, cylinduria and mild to moderate hematuria, only rarely producing azotemia. Associated hypertension may or may not be present.
The course of the disease is highly unpredictable. The onset may be stormy and acute with fever, resembling an acute bacterial infection, or may be so insidious that the onset cannot be defined. Remissions and exacerbations are common with a progressive downhill course. The acute case may terminate fatally in a few weeks without ever having a significant remission.

Laboratory evidence may show an increased erythrocyte sedimentation rate, anemia, elevated total protein with an increase in the globulin fraction; there may be elevation of the nonprotein nitrogen and blood urea nitrogen; the urinary findings are those of either acute or chronic nephritis, depending on the duration of the disease. Electrocardiogram may show evidence of pancarditis and roentgenogram may show collection of fluid in serous cavities.

The first necropsy report in cases of death from lupus erythematosus appeared in 1872 in Europe. Osler noted the visceral concomitants of the disease which are characterized by erythema. Among other things he emphasized the association of skin lesions with cardio-renal, neurologic and gastro-intestinal complications. However there was very little advance in the pathological features of this disease until Libman and Sacks observed some fifty years after the first autopsy report. Since that time there has been considerable progress in that direction with the contributions of Gross, Klemperer and others.

Although other organs may be involved, the gross and microscopic lesions of lupus erythematosus are found most frequently in the heart, lungs, kidneys and spleen.

In the heart a focal or diffuse pericarditis is frequently seen. The endocardium often shows a verrucous, nonbacterial endocarditis. These vegetations are not limited to the line of closure of the valves, but may occur on any portion of the endocardium. Both sides of the heart may show this type of endocarditis. The myocardium shows a fibrinoid degeneration of the interstitial collagen fibers.

In the spleen a periarterial fibrosis of the central arteries is often seen, and is considered by some to be pathognomonic of disseminated lupus erythematosus. This fibrosis occurs at the expense of the surrounding lymphocytes. Baggentoss has observed a musinuous edema of the alveolar walls in the lungs. This is associated with an interstitial pneumonitis and may be of such degree as to produce atelectasis and respiratory failure.

The kidney shows significant changes in the glomeruli associated with endothelial proliferation which may be of such extent as to produce obstruction of the glomerular capillary. The lesion which is said to be pathognomonic of lupus is the so-called “wire-loop” type of hyalin degeneration of the basement membrane of the glomerulus.

The etiology of lupus is still in the unknown, but there is considerable evidence to support the hypothesis that it is one of the
hypersensitivity or collagen diseases, appearing to be related to rheumatic fever, rheumatoid arthritis, glomerulonephritis, and periarteritis.

The lupus erythematosus or L. E. cell was first described by Har- graves, Richmond and Morton in 1948. The mechanism of formation of this cell is beyond the scope of this paper, but we can say that it is formed by the phagocytosis of a peculiar type of nuclear material which is present in the blood of lupus patients during the lysis of leukocytes. Three factors would therefore be necessary for the formation of L. E. cells: 1. a lytic or L. E. factor present only in the blood of patients with lupus erythematosus, 2. a source of nuclear protein to react with the lytic factor and 3. viable phagocytic leukocytes to engulf the lysed material.

L-E Cell, Bilateral Neutrophile; note the crescent-shaped, granular cytoplasm completely surrounds the homogeneous incusion body. Magnification 1000x; Enlarged 10 times.
An L. E. cell is a neutrophile which has phagocytosed a large amount of nuclear protein. This material is homogeneous and has a “ground glass” appearance; a rather large amount of this material is taken up so that the nucleus of the neutrophile is pushed aside giving it a crescent appearance with a very narrow border of cytoplasm around the inclusion body. With Wright’s stain the inclusion body stains lightly basophilic or eosinophilic.

L-E Body. Homogeneous, light-staining, protein central body surrounded by neutrophiles in process of phagocytosis. Magnification 1000x; enlarged 3 times.

Another stage of the same phenomenon is the L. E. body or rosette. This is a mass of homogeneous protein with several neutrophiles around it so that there is cytoplasm of the several neutrophiles completely surrounding the particle. Both the L. E. cell and body are considered to be pathognomonic of disseminated lupus erythematosus, the typical cell very rarely occurring in other conditions.
The only cell which is at all likely to lead to false positive reports is the "tart cell" which is a monocyte or histioocyte which has ingested nuclear products. The inclusion body of the tart cell stains intensely and is not homogeneous as compared to the L. E. cell inclusion body. The tart cell is occasionally seen even in normal blood or bone marrow. For the purpose of clearness it can be said that the L. E. cell is always a neutrophile, whereas the tart cell is a monocyte. In our consideration the tart cell is of no significance.

A group of neutrophiles surrounding a foreign body may give the impression of an L. E. Body because of the "rosette like" arrangement of the cells. Here, however, the center material is always granular, being composed of the disrupted cytoplasm of the neutrophiles.

Bone marrow aspiration has been reported to yield only a slightly higher percentage of positives than has peripheral blood. The method is the same whether peripheral blood or bone marrow is used, and as peripheral blood is more readily available to the average practitioner, we will discuss the L. E. cell preparation from peripheral blood.

Since the phenomenon was first reported in 1948 many methods and modifications have been described. Probably the most effective method is the so-called "clot preparation" of Zimmer and Hargraves. Five to ten cubic centimeters of blood is placed in a clean dry test tube and allowed to clot at room temperature for two hours. The clot is then thoroughly broken up with wooden applicator sticks. The serum which now contains many cells from the clot and is somewhat red is siphoned off and one cubic centimeter is placed in a Winthrobe hematocrit tube. This is then centrifuged at moderate speed (2000 RPM) for about ten minutes. The supernatant serum is discarded and a smear prepared from the "buffy coat" or white cell layer. It is important that the slide be clean and especially clear of grease. This preparation is then stained in the routine Wright stain method and examined. The L. E. cells are more likely to be found around the fringe areas of the smear.

Since 1950, reports of the favorable effect of cortisone and ACTH on the course of lupus have been appearing with increasing frequency. The effects of these agents are thought to be (1) a suppression of the arthralgia, fever, skin lesions and serositis; (2) increased appetite, weight gain, and increased sense of well being; (3) ability to withstand major crises such as acute infections; and (4) the production of remission in the acute episode.
At present it seems that the most desirable form of treatment is early intensive administration (Cortisone 300 mgm. daily or more) with gradual tapering off of dosage schedule over a period of several days. Both continuous administration of small amounts (Cortisone 25-50 mgm. daily) as a maintenance ration and intermittent courses of treatment have been reported as efficacious. At least one group feels that the production of a mild degree of Cushing's state or hyperadrenocorticism is the therapy of choice and dosage should be adjusted to produce and maintain this condition. At the present time it would be extremely difficult to state which of these forms of treatment is the most valuable, but all report much better results than with the pre-steroid patients, and some such form of hormonal therapy should be instituted as soon as the diagnosis of lupus erythematosus is established. These patients should be observed closely for the known complications of steroid therapy, such as potassium depletion, sodium retention and psychic disturbances. These patients should avoid sunlight because of its known deleterious influence.

**CASE REPORT**

MFS (53-764) This fourteen year old colored female was referred to the University Hospital on 1/13/53 with a referring diagnosis of congenital heart disease; she dated the onset of her illness to the summer of 1950. At that time she had an acute onset of dypsnea, orthopnea and productive cough. During this episode she had two severe bouts of epistaxis. Following this acute illness she was limited with dyspnea on slight exertion. At about this time she had an acute skin infection (she was not sure whether the skin infection preceded or followed the acute illness). In 1952 she was told by a physician that she had kidney trouble. In December 1952 she was hospitalized with a high fever which persisted until the time of admission to this hospital. Review of systems was not informative except for several episodes of arthralgia. Family history was not contributory.

Physical Examination revealed temperature 103 degrees F., pulse 140 beats per minute, respiration 40 per minute, blood pressure 120/75. She was a thin, undernourished colored female of some fourteen years, in obvious acute distress, also appearing chronically ill. The skin and mucous membranes revealed nothing except moderate pallor. The head and neck were of normal symmetry with no masses or adenopathy; the neck was supple. The eyes, ears, nose and throat showed only dilation of the alae nasi on inspiration and a mildly injected pharynx. The
thorax was of normal symmetry with exaggerated respiratory effort. The lungs were clear to palpation and percussion. The breath sounds were increased and of a bronchial character. The heart was slightly enlarged with the point of maximum intensity being in the sixth intercostal space some 2.5 centimeters outside the left midecavicular line. The second pulmonic sound was exaggerated and split, being considerably more intense than the second aortic sound. A diastolic gallop was audible throughout. No murmurs were heard. The abdomen was on plane; the liver was down some four centimeters to percussion and somewhat tender; there was considerable tenderness in the splenic area, but the spleen was not palpated because of voluntary rigidity. There was no peripheral edema; the nail beds were markedly cyanotic.

Initial laboratory work showed a hemoglobin of 7.8 grams percent, red cells 2.3 million per cubic millimeter, white cells 6,900 per cubic millimeter with normal differential; there was no immediate or delayed sickling; nonprotein nitrogen and blood sugar were within normal limits. Urine showed marked albuminuria, many red and white cells and hyaline casts.

Hospital course: On the second hospital day she received two pints of whole blood. At this time the fever had responded to Neopenil. On the third hospital day she went into a state of shock during which time the radial pulse and blood pressure were not obtainable. This failed to respond to all therapeutic efforts and lasted some twenty-four hours, during which time she remained conscious and unaware of change in her condition. On the fourth day all febrile agglutinations were reported as negative as were sputum studies for acid fast bacilli. On the sixth day stool specimen was reported as positive for occult blood; repeat urinalysis showed the same as initial study and total serum protein was reported as 11 grams per cent. It was also noted on that day that she had developed a lower nephron syndrome, urine output being less than fifty cubic centimeters in twenty-four hours. On the seventh hospital day an L. E. preparation by the thirty minute—anticoagulant method was reported as negative. On the tenth day a two hour clot L. E. preparation was strongly positive, many L. E. cells and bodies being present. At this time she was placed on 25 mgm. ACTH intravenously over an eight hour period daily. Her course was progressively downhill with increasing azotemia and continued urine output of less than one hundred cubic centimeters daily. On the nineteenth hospital day she died following a series of convulsions. Autopsy showed gross changes of fibrous pericarditis completely obliterating
the pericardial sac; no congenital anomalies were found. Fibrous adhesions of the pleura completely obliterated the pleural space; mucoid exudate filled the left lower lobe with some atelectasis; the kidneys had a mottled appearance and the capsules stripped with difficulty; there was some fibrosis of the spleen. At the time of this writing the microscopic findings from the autopsy are not available. Anatomical diagnosis: disseminated lupus erythematosus.

*Penicillin—G., diethylaminoethyl ester hydriodide—Smith, Kline & French. Trade Mark, Reg.*

Comment: This case illustrates several features of this disease. The absence of dermatitis at the time she was seen is interesting. Although there was a history of skin involvement earlier it was felt that this was a simple pyogenic affair. Although dermatitis is considered as one of the more common features of this disease, it is not necessary for a diagnosis. It was felt that most of this patient’s respiratory involvement was due to bronchiectasis, but in retrospect one wonders if this might not have been the mucinous edema with pneumonitis and atelectasis as reported by Baggentoss. It is also impossible to state whether this patient’s terminal kidney failure was due to a lower nephron syndrome following her period of shock or to lupus. From her urinary findings on several occasions it is certain that she had a nephritis which is compatible with that of lupus. The erratic fever spikes shown by this patient are not unusual. The terminal convulsions could have been either uremic or from central nervous system involvement with lupus.

Another point which this case illustrates is the efficacy of the clot preparation over the anticoagulation preparation. It also points to the futility of late diagnosis; with a patient in terminal condition at the time of diagnosis no form of treatment could be expected to do a great deal. One wonders if the correct diagnosis had been determined prior to the episode of shock if the outcome might not have been different. Had the diagnosis been made two months earlier we feel definitely that she might have been helped.

**SUMMARY:** The value of accurate early diagnosis of lupus erythematosus because of recent advances in treatment is mentioned. The clinical and pathological features of the disease are discussed briefly. The L. E. cell in diagnosis is discussed, the cell decribed, and the “clot preparation” method of preparing blood for examination for L. E. cells is presented. A case report is presented which illustrates the variability of the disease from the classical description.
REFERENCES


THE LIBRARY OF THE MEDICAL COLLEGE OF GEORGIA

In this issue of THE PROCEEDINGS you will find listed some of the recent additions to the Library of the Medical College of Georgia. These books have become part of a worthy and illustrious collection of medical publications, which began with purchases made by Dr. Louis A. Dugas in Europe in 1834. Each of the six members of the Medical College faculty donated one thousand dollars, and with this
Dr. Dugas was able to obtain a creditable library and museum for the young Georgia school. After more than a century, we deeply appreciate his ability and wisdom in the realm of book selection and feel that we are indeed fortunate in owning these rare and valuable works.

Since this noble beginning, the Library has increased to almost twenty-two thousand volumes (including bound periodicals). We receive nearly four hundred scientific periodicals. The majority of these are bound and added to the permanent collection. In order that users of the Library may obtain maximum benefit from our periodical holdings, we have the following indexes:

- QUARTERLY CUMULATIVE INDEX MEDICUS
- INDEX MEDICUS
- CURRENT LIST OF MEDICAL LITERATURE
- INDEX CATALOGUE OF THE SURGEON-GENERAL'S LIBRARY
- EXCERPTA MEDICA
- BIOLOGICAL ABSTRACTS
- CHEMICAL ABSTRACTS
- BRITISH ABSTRACTS, SECTION III, A.

We have grown, but there is still great need for further increase, not only in holdings, but also in housing facilities. This last problem will be solved on completion of the new Medical College Administration Building.

The Library is not a mere storehouse of books and periodicals. Its primary function is to serve its users, by making its resources accessible to the student, the faculty member, the research worker, and the practicing physician. Therefore, we urge each Alumnus of the Medical College of Georgia to take advantage of his privilege of using the Library. You may borrow any book or bound periodical for a limited period, merely by requesting it and by paying the postage both ways. We hope in subsequent issues of THE PROCEEDINGS to publish a complete list of the periodical holdings for your convenience.
RECENT ACQUISITIONS IN THE MEDICAL COLLEGE LIBRARY


American Psychiatric Association: Psychiatry and Medical Education. The Association. 1952.


Eller and Eller: Tumors of the Skin. 2nd ed. Lea and Febiger. 1951.


Master, Moser and Joffe: Cardiac Emergencies and Heart Failure. Lea and Febiger. 1952.

Murphy: Medical Emergencies. 4th ed. Davis. 1952.
Stewart: Cardiac Therapy. Hoeber. 1952.
THREE YEARS IN KOREA
Ovid B. Bush, Jr., M. D.

With more and more doctors having post-graduate training, the set-up of medical missions is changing. Before 1940, the idea of medical missions was to have a general practitioner in each mission station to do a small general practice. Since that time it has become more evident that by training native Christian doctors to practice good medicine, more could be done to change the medical picture in heathen lands. That has been the basis of the medical program in Korea. We set up a more or less medical center in Chunju, a tuberculosis hospital in Kwangju and a leper hospital in Soonchun (this last hospital was already there, but without supervision.)

The tuberculosis hospital was under the direction of Dr. H. A. Coldington and had about 50 beds. It is hoped that some form of out-patient treatment can be worked out so that more patients can be treated. Today the biggest public health problem, in so far as cause of death is concerned, is tuberculosis. Even if only 15% can be saved by using our out-patient treatment, it will be a big step forward in this problem. Iso-niazid may be part of this answer.

The leper hospital was operating before 1940, but had been without supervision except for what we could give periodically from Chunju. There were 1100 lepers in the compound. It is estimated that there are around 200,000 lepers in Korea, and less than one-fourth are in hospitals. At the present time all 1100 patients are in the Soonchun Hospital; approximately 300 are receiving Diason and Promine. The other 800 are receiving the new British drug, DDS. This is the parent substance found in diason and promine, but it is more toxic and very cheap. Someone is really needed to supervise this work.

The medical center at Chunju has around 100 beds and most of the training program for Christian doctors goes on there. Before the Korean war, Dr. P. S. Crane did the surgical work and I did the medical work. We had an American nurse who supervised the nursing in the hospital. Another nurse ran a nursing school which was one of the most modern and up-to-date, in so far as teaching was concerned, in all of Korea. The nurses' classes were set up to graduate 20 nurses a year, after the regular three year nursing course. A registered laboratory technician did practically any test we needed. We had a G-E X-ray machine with which we could do all types of X-ray work, and also a small portable machine for ward work.
The Korean staff at Chunju consisted of 65 members—25 nurses, 10 doctors (7 in training, the others regular workers) and the rest were workers in the offices, kitchen, cleaners, etc. Our idea was to take doctors who had just graduated from the Korean medical schools and train them for a period of one to three years, depending upon their aptitude. The first year was a general rotating type of internship, i.e., medicine, surgery, anesthesia, laboratory and X-ray, and time spent at the tuberculosis and leper hospitals. We had lectures and held weekly X-ray conferences. The next two years could be spent in a special field. Despite all efforts, we soon found that there was one major difficulty which we could not overcome. In spite of fairly adequate training on our part, the doctors were not ready for refined methods of diagnosis and treatment. The defect was in the medical schools themselves, which we found were totally inadequate. A graduate nurse in America would actually have a better idea of how to go about making a rational diagnosis and how to treat a patient than the 'so-called' doctors in Korea. The one idea with most Korean doctors is: KEEP THE PATIENT HAPPY, GIVE HIM WHAT HE WANTS, BE IT PILL OR INJECTION. When a doctor graduates from a medical school in Korea, he has never actually handled a patient himself. His work in school is all didactic. Most of these graduates go out to practice medicine without an internship. In fact it is not even necessary to go to medical school in order to get a licence to practice. A person can get one of several types of license. If he is a graduate of one of the three medical schools, he can get a license to practice anywhere in Korea. If he has studied some medical books and can pass a test, he can get a license to practice in a given state. And then, there is what is called a local license which can be procured by just reading a text on medicine and passing a test. This license gives the privilege of practicing in one given city. Those so-called doctors who practice with the Chinese “chim”, a silver needle which is stuck into the body at varying sites and depths depending upon the disease, fall into this last license group. These “doctors” also use fire, and a red hot “branding iron” is used to “drawout” the pain. Again all these “so-called” doctors in the last two groups, especially, depend upon pleasing the patient, and that was one of the big problems we had because the patient often was unhappy when we wouldn't let him be the doctor and we be the pharmacist. In the long run, however, we won because the people saw that we got the results where the others failed. So, in spite of not liking to take our medicine in the way that we said take it, they usually went ahead and did it just the same.
Our typical hospital day began with staff prayers, rounds, then the OR for Dr. Crane and his group, and the clinic for me and my group. Our usual clinic averaged 100 patients a day.

When our program of medical help to the doctors was just getting well on its way, and our first group of interns was finishing the year's training, the war began. Dr. Crane and I carried our families to Pusan. The U. S. Army asked us to stay in Pusan to help them as they had no doctors at all in Korea at that time. We stayed and set up a dispensary for them in Pusan. Then they asked us to go to Taejon and from there we went on back to Chunju. We continued our work, feeling that the North Koreans would be held at the Kum River, but they pulled a fast one on the Americans. All day long they came across the river as refugees, and that night blasted the American position. There was no defense of the southwest area of Korea, so word came for us to leave. We left, and the North Koreans came into Chunju three days later. Dr. Crane and I went to Japan, and for over two months worked for the U. S. Army as civilian doctors in Osaka Army Hospital. With the Inchon landing, our area of southwest Korea was re-opened and we were allowed to return.

On our return to Chunju, we were fortunate in that our hospital had not been damaged by the war. There was no defense against the North Koreans when they took Chunju and they offered no resistance to the American Army when they liberated the town. When we returned there were guerillas all around Chunju, but they never once tried to come in to the town. However, they did raid within two to three miles of Chunju. They were actually in control of the mountains twelve miles away. It was just a year ago that most of them were finally wiped out. The hospital had been pretty well stripped of the usable objects, but X-ray and laboratory were exactly as we had left them. The beds were still there, but all the mattresses and linens, as well as supplies, were gone. We were able to take out a truck load of the more valuable things, so within fifteen days, the hospital was open again and taking in-patients. It has continued to operate since that time in mid-November of 1950. In December 1950, the UN Civil Assistance Command moved a team into Chunju. That is the emergency team of the UN. Without their help we couldn't have done the job that they enabled us to do. Whenever we had need of drugs or supplies, they were always able to come up with what we needed. At one time, when the refugees were having practically an epidemic of bacil-
lary dysentery, the UN flew sulfaguanadine up from Pusan to meet the need. In time, with their help, we were able to get the hospital equipped with mattresses, sheets, blankets, and all the other needed hospital linens. With commercial shipping being unavailable, we had to get our supplies largely from them. Previously, we had gotten them from the States via boat, but for a time the only way we could get things in was by air freight; this cost prohibited most things except emergency needs.

In May 1951, Dr. Crane left Korea to take his third year of residency toward getting his surgical boards. Fortunately, we were able to get a Korean doctor who had been trained even before the Japanese-American war by one of the missionary surgeons and he had worked some with Dr. Crane. He came into the hospital group and did the surgery for us. Without his help we would have been in a bad way.

In June 1951, refugees began coming into the Chunju area for the first time in wholesale fashion. Previously they had drifted in on their own, so to speak, but now they were being sent in from behind the battle line by the train loads. The way they were packed into the freight cars would have had to be seen to have been believed. There was sitting room only, and when they were unloaded it was not unusual at all to find one or two bodies left in the car. They were indescribably filthy and literally crawling with lice. The Civil Assistance Command was on hand with DDT, but without thorough washing of themselves and their clothes, this condition posed an impossible task. They brought relapsing fever and small pox with them and for months, sporadic cases would break out. All of them were supposed to have been vaccinated, but many were only half done or not at all. Each time a group would come down with relapsing fever, the whole group would be DDT’d again, and it would quiet down for a while and then later reappear.

The camps for these people consisted of an old school, a factory building with one end blown off by a bomb, and a large room in another factory building which had no windows or doors. The last mentioned room had 700 people living in it at one time. Each family was allotted a 6 by 9 foot square to live in. The proximity, of course, facilitated the spread of disease and when it began, it spread throughout the whole group. They had an open well for water and used an open latrine; so in the summer, diarrhea was a major problem, especially in undernourished children. Actually, this first summer, people
died like flies and why many more didn’t die is beyond me. The first day they came into Chunju, the Civic Assistance Command Team came up to the hospital around 11 A. M. and asked us if we could take about 25 of the sickest refugees, which were to arrive about 2. We said we would and then went to work getting the nurses’ school, which wasn’t operating at that time, ready for the patients. Sure enough, the refugees arrived at 2, but instead of there being 25, 46 appeared. This kept up during the whole summer and fall, and we usually had around 75 additional patients all the time. For the first month after the refugees began coming in, we had an average of a death a day in the hospital, and there were 3 or 4 deaths a day at the refugee camps.

One of the greatest helps to the general health of the refugees at this time was the bringing in of milk by the UN. They brought in a car load of powdered milk, a lot of which was unfortunately wasted at first. They gave a can, Similac, to each family who had a child. However, the cans had the directions written in English and no verbal directions were given along with it, therefore the Koreans had no idea how to use the powdered milk. Some ate it dry, others diluted it too much to be effective, others didn’t dilute it enough, some sat around for the flies to contaminate it; so all in all, a mass of diarrhea broke out among the children. Then our nurses volunteered to go out to the camps each day and set up a milk bar for the children. They did this every day for six months. The change in the children was remarkable. When the children arrived, they were completely listless, sat around all day and never played. By the end of six months, they were all lively, running and playing all day, going to school and eagerly awaiting the 2 P. M. milk run.

One of the poorer traits of the Korean people, and typical of heathens the world over, showed up with the arrival of the refugees. It is the problem of the family. To a Korean, if you are a fifteenth cousin on your grandfather’s sister’s side, you are still a very definite member of the family and if you fall into bad luck, it is up to the members of the family to help you. But, if you are not a member of the family group, you mean absolutely nothing to the Korean. And this was just the case with these refugees. Most of them were from the area close to the 38th. parallel and from North Korea; so they had no relatives to help them in the South. The Korean doctors and hospitals did little or nothing for these refugees. In the state hospital, it would be days after they had been brought in by the UN
before they were seen and then often they were not even treated. Many times the UN brought a patient to us and asked us to take care of him because he had been at the state hospital a week and nothing had been done for him. It was soon apparent that there was more to be done in a preventive way than was being done, in addition to taking care of them in the hospital. So, we set up a clinic system at the refugee camps. It was the crudest type of medicine possible to do and still call it by the name of medicine, but it was the only way to reach the masses of refugees. We went to each camp one time a week in the afternoon after we had finished with the regular hospital work, and for one, two or three hours, depending on how many we had to see, we would hold "sick call." It was truly symptomatic treatment and that was all. The one to three hundred patients would line up and our five or six doctors, that could be spared from the hospital, would ask their complaint and very superficially examine them and give them what medicine seemed to be indicated. The whole run of disease was treated; worms, pneumonia, earache, malaria, right on up and down. The ones who were the sickest or needed surgery, we took into the hospital for treatment. However, I will be the first to admit that plenty were mistreated and plenty of diagnoses were missed, but we at least helped many. During the summer months, bacillary dysentery ran through the whole camp, and during the winter, in unheated windy buildings, pneumonia ran through. Relapsing fever went through according to the louse population. One of these was the hemorrhagic form. This was finally stopped by the repeated vaccination of all the refugees. Malnutrition was a big problem at first, but gradually the weaker ones died or improved with hospital care until the general health was fairly good. There was practically no way for them to get fresh foods. The government gave them a rice ration, of polished rice only, and a small amount of money which had to go for fuel.

In the winter of 1951, the ROK Army began a systematic clean up of the guerillas in southwest Korea. In the last part of January and early February of 1952 we began to get class "C" POWs. These were the civilians who were in the way of the mop-up and were put in POW camps. They were screened and found not to be guerillas; so they were sent up to our area for indoctrination in being good Koreans, and then turned loose to go back to their homes. The first groups sent into our area were sick, many had frost bite from being kept
in the mountains too long and many had pneumonia. So, early in February, between our regular patients, refugees and POWs, we had 225 in-patients, where our normal in-patient load had been 75-100. This was with the same staff as before. During the entire month of February, we ran over two hundred patients, then we began turning them out to return to their homes and we also began a system of dispersal of the refugees into the country around Chunju.

There are many medical problems in Korea which we do not have in America. Their major public health problem is worms. It is estimated that from 95-97% of all Koreans have worms. We have seen as many as five different worms in one person. The largest problem as far as mortality is concerned is tuberculosis. We took 500 routine clinic patients and ran serologies on them; we found that 24% of this group were positive. Naturally this was a series of sick people and also the question of false positive from malaria, leprosy and the like would make the total population with syphilis somewhere in the neighborhood of 14%. It is strange that there is so little C. N. S. syphilis, and the reason for this, I feel, is that malaria is so prevalent. Small pox and relapsing fever have been mentioned previously. It is surprising how many people in Korea have dormant malaria and after an operation, up it springs. Leprosy is another problem for which a lot could be done. With the new drugs, there is hope that in time it could be eradicated. There are some local problems, one of which is the liver fluke, Clonorchis sinensis. It is in belts in Korea, apparently where the salt water and the fresh water mix, this fluke lives best. We were able to help some patients who had this fluke, by giving them chloroquine, but we were never able to get the stools negative. We are still working on that problem and hope to have the answer eventually.

I feel that the work that I have done in Korea, during these last few years, will be the biggest contribution I will ever be able to make to medicine, as far as actually saving lives is concerned, I know that if all of us had not been in Korea to operate our hospital that many more hundreds of lives would have been lost than were lost. I count it a privilege to have been able to be in Korea in these times.
MARRIAGES

Dr. Robert P. Coggins, '51, and Alice Ellen Holston of Augusta were married on November 22, 1952 at the First Baptist Church, Augusta. Dr. Coggins is a member of the resident staff at the University Hospital and his wife is a nurse.

Dr. Charles B. Shiver, '49, and Miss Claire Langley were married on November 7, 1952 at the First Baptist Church, Augusta. Dr. Shiver is now a Resident on Medicine at the University Hospital and his wife is working with the Cancer Service for the State.

Dr. Harold Mims, '48, whose home is in Hephzibah, Georgia, visited the campus during the Christmas Holidays. He is now a Resident on Surgery at Baylor Hospital, Dallas, Texas. It was of interest to us here that he had recently married a nurse from Amarillo, Texas, the former Miss Shirley White.

BIRTHS

A daughter, Mozelle Neely Palmer, was born to Dr. and Mrs. John R. Palmer, '42, in Chicago. Dr. Palmer is stationed at the U. S. Naval Hospital, Great Lakes, Ill.

On October 25, 1952, a son was born to Dr. and Mrs. Edwin Allen, '51, of Swansea, S. C. He was given the name of Richard William.

It was a daughter for the W. Eugene Hardens, '52, of Columbus, Georgia. She was born on January 20th., and bears the name of Doris (for her Mother) Marie.

Nancy Lenette is the name given to the most recent addition in the Zeb Burrell, '52, family. She was born at the University Hospital on December 7, 1952.

A daughter was born in January to the Richard Carters, '52, of Orlando, Fla.

In December 1952, the W. H. Pools, '52, of Jacksonville, Fla., became the proud parents of a son.

Dr. and Mrs. Joseph L. Caldwell, '51, announce the birth of a son, Joseph L. III, on October 27, 1952, at the U. S. Naval Hospital, Portsmouth, Va. Dr. Caldwell served his internship at the Portsmouth Naval Hospital and is now stationed at the Naval Air Station in Norfolk.
DEATHS

Dr. Jackson T. Giles, '43, age 34, of Valdosta, died at his home November 4. He had been in a plane crash in 1949, at which time he suffered a broken back and other injuries. Since that time, he had been in ill health. Dr. Giles moved with his family to Valdosta, from Griffin, about ten months ago.

Dr. Harry H. McGee, '24, age 51, of Savannah, died at the Duke University Hospital, Durham, N. C., where he had been undergoing treatment for the previous eight weeks. Dr. McGee was a past President of the Georgia Medical Society.

Dr. Henry W. Doster, '90, died at the University Hospital, Augusta on December 23, 1952. Dr. Doster, who was 86 years of age, was a native of Jasper County and had practiced medicine in Screven County for fifty years.

The death of Dr. Grantland S. Miller, '49, of Raven, Virginia was surrounded by a mystery that may never be solved. After having eluded the police, he returned to his home and was arrested for reckless driving. When he reported to the Richlands Police Station to post bond on November 23rd, he collapsed and all efforts to revive him were unsuccessful. In the absence of a definite cause of death, police and medical authorities theorized that he may have been a victim of an overdose of some form of medicine. The real cause of death has yet to be determined.

Dr. and Mrs. J. D. McArthur of Lyons, Georgia visited New Orleans over the holidays and attended the Tech-Mississippi game. Mrs. McArthur is the former Miss Marjorie Adams of Augusta, and they have two children, Randy and Cathy.

Miss Betty Kilpatrick, grand-daughter of Dr. Andrew J. Kilpatrick, '96, was presented to Augusta society at the Assembly Ball, held at the Augusta Country Club.

On Sunday, December 21, Dr. and Mrs. Bernard L. Shackleford, '21, entertained with a luncheon at the Capitol City Country Club, Atlanta, for Dr. and Mrs. Major Fowler, whose marriage was a recent event.
Dr. and Mrs. John Ellis, '44, entertained with a cocktail party on December 21, 1952, at their home on Meredith Rd., Atlanta, Georgia.

The Savannah Morning News for December 30, 1952, carried a picture showing Dr. Harold Smith, '39, taking his oath for a new four-year term as Coroner of Chatham County.

The plan to help get the University Hospital out of debt must be approved by the County Commission before it can be put into effect. However at the City Council meeting of December 29, 1952, the city voted to turn over to the hospital about $37,000 remaining unspent in the 1952 budget appropriation for care of indigent patients. Also recommended was a joint city-county sponsorship of a $275,000 loan to pay off accumulated hospital debts. The city would pay back 80% of the loan over a five-year period, and the county would be asked to pay the other 20%. A similar loan for about $200,000 was made in 1947 and has just been paid off this year.

Dr. George A. McCrary is associated with Dr. Anthony J. Martin in the practice of surgery. Their offices are at 942 West Peachtree St., NW, Atlanta, Georgia. Dr. McCrary is an alumnus of the Class of 1950; he served his internship and residency at Crawford Long Memorial Hospital in Atlanta.

Dr. C. Kenneth Singleton, '50, is now practicing in Cairo, Georgia.

Dr. Karl A. Leitheiser, '52, has transferred from the Duke University Hospital to the University Hospital, Augusta, to complete his internship. He is at present working with Dr. O'Rear in pediatrics.

Dr. William Vincent Roberts, '43, is now a Lieutenant, USNR stationed at the School of Aviation Medicine, U. S. Naval Air Station, Pensacola, Fla.

Dr. John M. Anderson, '38, former superintendent of the Topeka State Hospital, Topeka, Kan., has resigned his position there and will enter private practice in Atlanta. Dr. Anderson is a native of Barnesville, Georgia.

Dr. Russell E. Andrews, Jr., '46, of Rome, was recently appointed plant physician at the Celanese Corp., Rome, Georgia. He will replace Dr. Walter G. Hackett who has been called to military duty at Gunter Air Base, Montgomery, Ala.
Dr. H. L. Barker, '12, of Carrollton, was elected president at the regular monthly meeting of the Active Staff of Tanner Memorial Hospital.

Dr. William L. Bridges, '46, is now associated with Drs. C. S. Pittman, Jr., '42, and C. S. Pittman, Sr., at 822-24 Tift Ave., Tifton. His practice is limited to pediatrics.

Dr. Floyd Sanders, '44, and Dr. Howard Lee, '44, of Decatur were entertained in their new offices at 603 Church St., Decatur, at an open house given by the wives of the physicians and the office staff.

Dr. R. E. Fokes, Jr., '43, of Moultrie, and Dr. Joseph L. Berg, '41, of Albany, were recently admitted to the American Board of Ophthalmology.

Dr. H. D. Meaders, '41, formerly of Newnan, has opened offices in Marietta for the practice of Obstetrics and Gynecology. He will occupy the office of Dr. Jack Hodges, '47, who has been called into the Army.

Dr. Herbert S. Ogden, '42, has recently been appointed Medical Editor of NEW YORK MEDICINE.

Dr. John B. Bowen, '39, was released from military service on Christmas Eve and has returned to his practice in Augusta. Dr. Bowen is also on the surgical faculty of the Medical College.

Dr. Frank Story, '52, and Dr. Ira Goldberg, '48, both visited their Alma Mater during the Christmas holidays.

Dr. Henry Mixson, '43, and Mrs. Mixson, of Valdosta, visited Augusta during December. They were seen in the hospital corridors with Drs. Gordon Kelly, "Pepper" Martin, and Robert Ellison. Their daughter is now a student at the University of Georgia.

Dr. Thomas B. Brantley, '12, of Hiltonia, Ga., has retired and is now living with his daughter in Savannah.

Dr. J. C. Barnett, '49, recently returned from Korea and is now stationed at Camp Gordon, Ga. When he visited the school in December, he told that most of his work in Korea was in neurosurgery, in which he has become so interested that he would like to make it his specialty.
There was an item in a recent issue of the Journal of the Medical Association of Georgia which may be of interest to some of you who are not subscribers to that journal. It read: "In Jefferson County, the Pilcher family has done its share toward providing doctors for the State of Georgia. Dr. J. J. Pilcher, '16, son of a physician, watched his own son, J. J. Pilcher, '52, receive his degree of doctor of medicine. It is an old story for Dr. Pilcher because his other sons, James W., '43, George S., '50, had previously chosen the medical profession. And, next Fall, another son of Dr. Pilcher, Wallace H., will start his pre-medical studies".

Of interest to the alumni is the recent release of a new book, PRINCIPLES OF HOSPITAL ADMINISTRATION, written by Dr. John R. McGibony, who was born in Greene County and reared in Greensboro, Georgia. The book is dedicated to his brother, Mr. Hampton McGibony, who is a member of the hospital authority of the Minnie G. Boswell Memorial Hospital in Greensboro. Dr. McGibony graduated from the Medical College of Georgia in 1927 and for many years has been a medical officer with the U. S. Public Health Service. He has had extensive experience in hospital administration, including smaller ones, and PRINCIPLES OF HOSPITAL ADMINISTRATION has been prepared with a distinct slant toward considering problems of the smaller hospitals and contains a great deal of informative material. It has been commended as a useful and valuable addition to any professional library.

ATTENTION has been called to the mistaken addresses which appeared in the Directory Issue. Dr. Lawrence H. McCalla, '21, has offices in the Professional Building, Greenville, S. C.; Dr. Jerald G. Wooley, '10, is with the National Institute of Arthritis and Metabolic Diseases, National Institutes of Health, Bethesda 14, Maryland.

Dr. Henry M. Michel, '96, has been hospitalized for several months at the Veterans Hospital, Forest Hills, (formerly Oliver General Hosp.)

Dr. and Mrs. Alex R. Kelly, '38, and son, Alex III, of Roanoke, Va. spent the Christmas vacation with Dr. Kelly's parents in Augusta.

Other visitors to Augusta during the holidays were Dr. and Mrs. Harry Wasden, '32, and children, LaFilse and Billy, of Quitman, Georgia; Dr. and Mrs. Richard Stelling, '30, of Greensboro, N. C.; and Dr. Alex T. Murphey who was on leave from the battleship Wisconsin.
Dr. George Lacy, former member of the faculty in the Department of Pathology, and Mrs. Lacy and son, have left Augusta for Asheville, N. C. where they will make their home.

The members of the Screvens County Medical Society were hosts to the Tri-County medical group at a dinner meeting in December. Dr. Katrine Hawkins, '40, is president of the Screvens society and was in charge of the meeting. Those attending were Dr. A. P. Mulkey, '34, Dr. Q. A. Mulkey, '09, and Dr. H. G. Lee, '20 all of Millen; Dr. Cleveland Thompson, '09, Dr. Cleve Thompson Jr., '49, Dr. J. Miller Byne, '28, and Dr. D. L. Butterfield, all of Waynesboro; Dr. W. W. Hillis, '09, of Sardis; Dr. Henry Perkins, '29, of Augusta; and Dr. Revels of Louisville. Dr. W. G. Simmons, Dr. G. B. Hogsette, '45, Dr. James Freeman and Dr. Hawkins were the host doctors.

Double tragedy struck the family of Dr. Joseph L. Caldwell, '51. While he was returning to Augusta to attend his father's funeral, his car collided with another one on the road between Durham and Fayetteville, N. C. Dr. Caldwell received several broken ribs, lacerations about the face and an injured knee. Mrs. Caldwell received a slight concussion. The children were only slightly bruised.

Dr. Robert L. Rhodes, who has been part-time Professor of Clinical Surgery, for many years, was retired effective October 1, 1952. The Committee on Education of the Board of Regents of the University System of Georgia has now granted him the title of Professor Emeritus of Clinical Surgery.