

economy of the British field hospitals, but effected no immediately beneficial change in their methods of transportation. Nor was anything done until the outbreak of the Crimean War, when a hospital conveyance corps was hastily organized and shipped with the troops. This was so decided a failure that the work of transporting the wounded had to be transferred to the subsistence department. The wagons of the conveyance corps were too heavy; no provision was made for repair in case of accidents; and the men were old, broken-down, and often dissipated soldiers weeded out of the regimental ranks rather than selected on account of special fitness for important duties. A medical staff corps was then organized, but this failed on account of its being composed of hired civilians. In 1873 a hospital corps of enlisted men was authorized. During the military operations of recent years in many parts of the empire, British medical officers have had opportunities of improving their methods, and have so profited by them that much commendation has been bestowed upon the army medical department for its efficiency during the war now in progress in South Africa. Sir William MacCormack and Mr. Frederick Treves, who were sent by the British government to the seat of war as consultants, have testified to the successful organization and efficient work of the department from the first aid stations with the troops actually engaged to the general hospitals at the base of supplies. Officers, enlisted men, newspaper reporters, and, in fact, all who have written of this subject have borne testimony to the bravery and efficiency of medical officers and men and the abundance of their supplies. Lord Methuen, after the battle of Modder River, called attention to the splendid hospital arrangements, stating that on the afternoon of the day after the battle all his wounded were on their way to Cape Town.

An infantry division of the British army comprises two brigades, with three attached field batteries and a company of engineers. Each brigade consists of four battalions, or about four thousand men. Each battalion, artillery division, and engineer company has assigned to it a medical officer, who accompanies it into action with his orderly, to give first aid to the wounded, while the regimental bearers are ready to carry the first cases to the collecting or dressing stations.

To each brigade is attached one bearer company consisting of three officers, one sergeant-major, twelve sergeants and corporals, one bugler, and forty-four privates of the royal army medical corps, with thirty-eight men of the army service corps for transport duties. The men of the bearer company relieve the regimental bearers and bring the wounded to an advanced ambulance post, where there are wagons to carry them to the dressing station. This station is organized in some building out of the line of fire, or if no building is available the operating tent is pitched. The major of the bearer company, with one other medical officer, four non-commissioned officers, and four privates, one of whom is a cook, are on duty here, to examine and dress wounds, administer medical comforts, and place the wounded in ambulances to be carried to the field hospital.

Twelve field hospitals are attached to the corps of three divisions and attached troops, numbering in all about thirty-four thousand fighting men. Each is equipped for one hundred beds, but is so organized that sections of twenty-five beds may be unpacked and used separately. The personnel of each is four medical officers, one quartermaster, one sergeant-major, eleven sergeants and corporals, and twenty-three privates of the medical corps, with a sergeant and nineteen privates of the army service corps. As these hospitals have to accompany the troops, the wounded are sent as soon as possible to a post on the lines of communication. For service in the bearer companies and field hospitals an enlisted strength is provided equal to four per cent. of the fighting force. This percentage does not include the temporary services of the regimental bearers.

The lines of communication in the present campaign in South Africa are long. For the wounded who are

unable to bear the fatigue of a long journey to the base of supplies, stationary hospitals have been provided along the line of rail. Each of these is equipped for one hundred beds in two sections of fifty beds. The personnel is similar to that of the field hospital, but without the army service men. Buildings are used when available, otherwise tents to form a camp are forwarded from the base.

General hospitals at the base of supplies have each accommodations for twenty officers and five hundred wounded men. Four of these were mobilized and sent with the first troops to Africa. Suitable buildings are selected. The staff of each consists of a colonel and seven officers, including a quartermaster, with eleven civilian surgeons, a woman superintendent and eight nursing sisters, two warrant officers, twenty-six sergeants and corporals, and one hundred and fifteen privates of the medical corps. Supplies of medical stores are established at the base and advanced depots are thrown forward to positions where the field hospitals and bearer companies can draw on them. Systematically equipped hospital trains bring the sick and wounded from the field and stationary hospitals to the base. Hospital steamers carry those invalidated to England.

These brief sketches of the field-hospital organization of the German, French, and British armies, supplementing what has been said concerning our own experiences in this line of military service, will enable the reader to appreciate the great advance that has been made since the time of the Napoleonic wars. Field-hospital organization is now so well understood that with a medical and hospital corps of sufficient numerical strength for the needs of the command, with liberal appropriations for the purchase of equipment and supplies, and with full control over its transportation, there need be and would be no failure on the part of the medical department to care for the wounded under the most severe strain of the trying times of war.

Charles Smart.

ARMY HOSPITAL CORPS.—For many years, during and after the revolution, the selection of the personnel of hospitals was left to the surgeons in charge. The stewards and ward masters, nurses and cooks were either detailed soldiers or civilians at the option of the surgeon.

The Army Regulations of 1821 for the first time distinctly provided that cooks and nurses in hospitals should be taken from the privates of the army, although such had doubtless been the usual practice before that date. During the civil war civilians, both men and women, were largely employed as nurses, especially in the general hospitals. They may also have been employed to a limited extent in the war with Mexico. With these exceptions, hospital attendants were obtained, from 1821 until the organization of the hospital corps in 1887, wholly by the detail of soldiers of the line, an arrangement which was always unsatisfactory, for it was difficult to secure the best men of the command for such duty, and the length of the detail being uncertain and promotion practically unknown, there was little to stimulate the ambition of the attendant.

The employment of civilians as hospital stewards for post and regiments, as well as for general hospitals, was still authorized in 1821; but as in the Indian wars which resulted from the spread of civilization westward, the activity of the army was transferred to the frontier, it no doubt became increasingly difficult to hire suitable civilians, while experience showed that it was desirable that the incumbent of this position should be amenable to military discipline and held to a definite term of service.

It therefore soon became the rule that hospital stewards should be detailed from the line, as is shown by the fact that in 1833 an order from the War Department gave authority for the enlistment of a hospital steward at posts where a suitable man could not be obtained from the command. But even though specially enlisted as hospital steward he was still mustered with a company

and regarded as a detailed soldier of the line, and in 1842 the adjutant-general decided that in case of emergency he could be required to perform military duty as such. Since the hospital steward could be returned to the line at any time at the caprice of the commanding officer, the necessity of securing for him a more permanent status was felt, and Congress in 1856 authorized the appointment of hospital stewards from the enlisted men of the army who should be permanently attached to the medical and hospital department. Commanding officers were, however, still permitted to detail, upon the recommendation of the medical officer, a soldier to act as hospital steward for field duty or at stations where there was no hospital steward. These men were at first known as acting hospital stewards. After 1864 they were called hospital stewards of the second class if detailed for duty at posts of more than four companies, and hospital stewards of the third class if at posts of four or less companies.

In 1862 the employment of civilians as cooks and nurses in the general hospitals having been authorized, the surgeon-general published regulations for the "Hospital Corps, U. S. Army," which was to be composed of civilians hired under contract for the period of one year, unless sooner discharged. Except in name this organization bears no resemblance to the present hospital corps, which was created by the act of Congress, March 1, 1887. This act required that hospital stewards should have served at least twelve months as acting hospital stewards, and have passed a satisfactory examination under the authority of the surgeon-general. It provided that privates of the hospital corps should be enlisted or transferred from the line, that acting hospital stewards should be appointed by the detail of suitable privates, and that the corps thus created should be permanently attached to the medical department, and should not be included in the effective strength of the army.

The number of men allowed in each grade was not fixed by this act. In 1896 the number of hospital stewards was limited by act of Congress to one hundred, which number constituted the allowance until the outbreak of the war with Spain, when an increase of one hundred hospital stewards was authorized for the war only. The number of hospital stewards was accordingly increased to two hundred, of whom one hundred and seventy still remained in service on March 31, 1900. By Act of Congress of May 26, 1900, the maximum allowance of hospital stewards was permanently fixed at two hundred.

There is no definite allowance of acting hospital stewards and privates, their number being regulated solely by the needs of the service.

The size of the hospital corps and the ratio of non-commissioned officers to privates will depend not only upon the actual size of the army, but upon the conditions existing at the time as respects active operations and the size of the commands in which the army is divided.

The high percentage of non-commissioned officers before the war with Spain was due to the large number of small posts, each of which was provided with a hospital steward, but required only a small detachment of privates. That the relative number of non-commissioned officers is less at the present time is due partly to the large number of privates stationed at general hospitals, at which the number of non-commissioned officers needed is comparatively small, and partly to the difficulty of securing a sufficient number of acting hospital stewards and the limitation by law of the number of hospital stewards.

For an army in active service or under the conditions which obtained in the Philippines, an allowance of hospital corps men, including non-commissioned officers, of at least four per cent. of the combatant strength is necessary. The chief surgeon of the Department of the Pacific (Philippine Islands) has estimated that acting hospital stewards in the proportion of one-half of one per cent. and privates in the proportion of three and one-half per cent. of the strength of the army should be provided for

his department. Hospital stewards are not included in this estimate.

Army Regulations provide that there shall be a hospital steward and three privates of the hospital corps at every military post, four privates if the garrison consists of two companies, and an additional private for each additional two companies. If the garrison consists of six companies, there will be two hospital stewards and an additional hospital steward for every additional six companies. At every post of two companies there will also be an acting hospital steward.

The needs of foreign service have made it necessary of late to diminish this allowance of non-commissioned officers at posts within the United States. In view of the increased size of the companies at the present time, the Secretary of War has authorized an allowance of four privates of the hospital corps for one-company posts, five for two-company posts, and one additional private for every two additional companies. In the Volunteers, as at present organized, each regiment has three hospital stewards who are regimental non-commissioned officers. There being no provision of law for a Volunteer hospital corps, one acting hospital steward and twelve privates of the hospital corps, all of whom belong to the regular army, are assigned to each regiment. Regular regiments serving without the United States are allowed one hospital steward, three acting hospital stewards, and twelve privates. On March 31, 1898, there were in service 100 hospital stewards, 103 acting hospital stewards, and 520 privates, a total of 723 men. The following table shows the strength and the distribution of the hospital corps on March 31, 1900:

STRENGTH AND DISTRIBUTION OF THE HOSPITAL CORPS, MARCH 31, 1900.

	Hospital stewards.	Acting hospital stewards.	Privates.	Total.
United States	92	110	1,905	1,207
Cuba	21	47	327	395
Porto Rico	4	19	93	116
Hawaii	2	3	22	27
Philippines and en route	47*	167	1,934	2,148
Atlantic transports	8	15	..
Pacific transports	8	25	148
Hospital ships	4	7	81	..
Total strength	170	369	3,502	4,041

* Seventy-four hospital stewards of Volunteers are also on duty in the Philippines.

The hospital steward is of the same grade of rank as ordnance sergeants, post quartermaster sergeants, chief musicians, principal musicians, first-class sergeants of the signal corps, chief trumpeters and saddler sergeants, and is only ranked among non-commissioned officers by the regimental sergeants major and quartermaster sergeants.

The duties of hospital stewards, as defined in the manual for the medical department, are to look after and distribute hospital stores and supplies, care for hospital property, compound and administer medicine, supervise the preparation and serving of food, maintain discipline in hospitals, watch over their general police, prepare reports and returns, supervise the duties of members of the hospital corps in the hospital and in the field, and perform such other duties as may by proper authority be required of them.

No other non-commissioned officer requires so much special knowledge for the proper discharge of his duties, or has such a variety of duties to perform, as the hospital steward. Like the first sergeant of a company the hospital steward must be a good disciplinarian, drill master, and general supervisor of the duties of the men under his control. He prepares or supervises the preparation of the numerous reports, returns, and other official papers, some of them voluminous and complicated, which must be made not only to the surgeon-general, but to the adjutant-general, the quartermaster-general, the chief of

ordnance, and the paymaster-general, and keeps a record of official correspondence. He must be unwearied in his care for the multiplicity of articles embraced under the name of hospital property. He must be an expert pharmacist, and have sufficient knowledge of medicine and surgery to be able to act intelligently in emergencies in the absence of the surgeon.

It is very commonly supposed that skill in pharmacy is the essential qualification of the hospital steward, and pharmacists often confidently apply for appointment as hospital stewards, referring to their knowledge of drugs as evidence of their fitness for the position. But such knowledge, while important, is by no means the most important requisite.

It is very wisely provided that the candidate for the position of hospital steward must have served at least three months as private of the hospital corps, and at least one year as acting hospital steward (the great majority of hospital stewards serve much longer than this in the lower grades), before he becomes eligible for examination for promotion, since familiarity not only with army regulations but also with the unwritten rules, usually known as the "customs and usages of the service," which should govern his conduct in his relations with superiors and inferiors in the military hierarchy, is absolutely essential to his usefulness, and such knowledge is to be acquired only by actual service with troops in garrison and in the field.

A candidate for the position of hospital steward, as has already been stated, must have served at least one year as acting hospital steward. Application for examination must be accompanied by an affidavit that the candidate is not married. Examination is held by a board of three medical officers or such number less than three as may be on duty at the post. The board investigates and reports upon the applicant's physical condition, character, and habits, especially as to the use of stimulants and narcotics, discipline and control of men, knowledge of regulations, nursing, dispensary work, clerical work, principles of cooking and mess management, hospital corps drill, minor surgery and first aid, including the extraction of teeth.

A written examination is also held, questions being prepared in the office of the surgeon-general upon the following subjects: arithmetic, materia medica, pharmacy, care of sick and ward management, minor surgery, and first aid and elementary hygiene. Efficiency in penmanship and orthography, which is also taken into account, is estimated from the papers submitted. Replies, which are certified to by the board as having been made without recourse to books, memoranda, or other sources of assistance, are forwarded with reports of the board direct to the surgeon-general, in whose office the written examinations are marked.

The candidate, if successful, takes rank in his class in accordance with the percentage which he has obtained on the examination. A re-examination before a first re-enlistment as hospital steward may not be required if the surgeon at the post, or chief surgeon of the department, states that the steward has performed his duties efficiently, but is held before a second re-enlistment. No subsequent re-examination is ordinarily required.

Hospital stewards may be discharged by sentence of court martial, but cannot be reduced to the ranks.

As we have already seen, acting hospital stewards are historically the successors of the hospital stewards of the second and third class, also known as acting hospital stewards, who were soldiers of the line simply detailed for duty in the medical department. As the name implies, the acting hospital steward may be called upon to perform all of the duties of the hospital steward. Since the expansion of the army, due to the war with Spain, the insufficient number of hospital stewards has made it necessary to use many acting hospital stewards as stewards at the smaller posts. Before the late war, the acting stewards were generally assigned as assistant stewards in posts of two or more companies.

Owing to the unfortunate wording of the act of March

1, 1887, which speaks of the detail, not the appointment, of privates as acting hospital stewards, it was long held that the acting hospital steward is not a true non-commissioned officer, that his office is not a grade but a detail which lapses upon discharge, so that he then reverts to the status of private. Practically, however, he has always been regarded as a non-commissioned officer, and indeed is ranked with sergeants by Army Regulations, and a recent decision of the Comptroller of the Treasury grants him travel pay upon discharge and retired pay as an acting hospital steward, not as a private.

A service of one year as private in the hospital corps was formerly necessary before the examination for detail as acting hospital steward could be taken. This time was reduced to three months in 1899, because of the great need of additional acting hospital stewards, and the desire to utilize the services as acting hospital stewards of privates who had recently enlisted and who were to a certain extent qualified for the position by previous training in medicine, pharmacy, or nursing. The examination for detail as acting hospital steward embraces the same subjects as the hospital steward examination, but is less difficult. As in the case of hospital stewards, application for examination must be accompanied by an affidavit that the candidate is not married. Acting hospital stewards may be reduced to the grade of private of the hospital corps by the commanding officer for inefficiency or bad conduct.

In time of peace privates are obtained either by direct enlistment or by the voluntary transfer of enlisted men who have served at least a year in the line. Enlistments of civilians for the hospital corps are made preferably by medical officers. The term of service is three years. Authority for the transfer and enlistment is in all cases obtained from the surgeon-general. The physical examination for the hospital corps is the same as for the line, except that applicants may be accepted whose vision is below the normal, provided that the defect is due solely to comparatively slight errors of refraction (less than ten-twentieths), which are not progressive or accompanied by ocular disease, and which can be entirely corrected with glasses. As members of the hospital corps are not taught to shoot, acuity of vision is not as important for them as for men of the line, but it is essential that they shall be able to see sufficiently well not to be helpless if they lose their glasses in the field.

In addition to the physical examination, the applicant for admission to the hospital corps is required to give evidence that he can read and write, and that he possesses intelligence and aptitude for the duties which he will be called upon to perform. He must also present satisfactory testimonials as to his character from his late employer or other reputable citizens. After enlistment the recruit is usually sent to a hospital corps school, where he is given a course of instruction in nursing, first aid, etc., and in drill, preparatory to his assignment to a military post.

The duties which privates of the hospital corps are required to perform at military posts naturally vary somewhat with the size of the hospitals. At large hospitals, where the detachment consists of one hundred or more men, the duties of each man are narrowly defined and specialized. There are nurses, cooks, dispensers, clerks, operating-room, dead-house, and laboratory attendants, watchmen, gardeners, even buglers, carpenters, plumbers, and perhaps painters. At the smallest posts there may be but a nurse, a cook, and an outside man who raises vegetables, milks, supplies fuel, and on occasion helps with the nursing.

Hospital stewards receive \$45 per month, acting hospital stewards \$25 per month, and privates \$18 per month. The monthly pay is increased with the length of service, as shown in the subjoined table, \$2 per month after five years' continuous service, and an additional increase of \$1 per month for each subsequent period of five years. To be entitled to this increase the service must be continuous, that is, the soldier must re-enlist within three months after the date of discharge.

TABLE OF MONTHLY PAY OF MEMBERS OF HOSPITAL CORPS, CONTINUOUS SERVICE.

	Hospital stewards.	Acting hospital stewards.	Privates.
First enlistment:			
First and second years	45	25	18
Third year	46	26	19
Second enlistment:			
First year	47	27	20
Second year	48	28	21
Third year	50	30	23
Third enlistment:			
Each year	50	30	23
Fourth enlistment:			
First year	50	30	23
Second and third years	51	31	24

The pay of a soldier who has served five years and who re-enlists after a longer interval than three months begins with the amount fixed for the second year of the second enlistment (fifth year of continuous service). One dollar per month of this "re-enlistment pay" is, however, retained until discharge, and is forfeited if the soldier has not served honestly and faithfully, or if he is discharged for disability due to his own misconduct. Twenty per cent. increase on the pay proper of all enlisted men is allowed in time of war. A certificate of merit granted an enlisted man for distinguished service (generally conspicuous gallantry in action) carries with it additional pay at the rate of \$2 per month as long as the holder is in the army.

In addition to their pay, all enlisted men receive rations, clothing, medicines, and medical attendance. A certain money allowance for clothing is made to each grade, and the clothing drawn by each individual is charged against his allowance. With care a considerable saving can be made upon this allowance. The balance not used is paid in cash upon discharge from the service.

The money allowance for the several grades in the hospital corps, according to the last clothing list, is given below. The allowance for hospital stewards is fixed; that of acting hospital stewards and privates is that of corporals of the branch of the service with which they are serving. The allowance given in the table is the highest, that of corporal of cavalry. If serving with infantry, the total allowance for three years of acting hospital stewards and privates is \$130.12.

MONEY ALLOWANCE FOR CLOTHING, MEMBERS OF THE HOSPITAL CORPS.

	Hospital stewards.	Acting hospital stewards and privates.
Total first six months, first year	\$60.77	\$63.33
Total second six months, first year	11.13	11.13
Total second year	31.39	34.31
Total third year	30.29	29.56
Total for three years	\$133.58	\$138.33

An increase of \$30 per annum is allowed hospital corps men of all grades who are serving in the Department of Alaska, to provide for the extra clothing necessary for protection against extreme cold.

Savings in sums of not less than five dollars can be deposited with an army paymaster. Interest at the rate of four per cent. per annum is allowed on such deposits until discharge. Deposits are non-forfeitable except for desertion. Twelve and one-half cents per month is deducted from the pay of each soldier for the support of the Soldiers' Home. A service of twenty years in the army, or the existence of physical disability contracted in the line of duty, entitles the soldier to admission to the institution at Washington, D. C., or to the branch recently established at Fort Bayard, New Mexico, for the reception of tuberculous patients.

Upon discharge the soldier is entitled to travel pay to the place of enlistment. This is computed by taking the distance in miles by the shortest usually traveled route from place of discharge to that of enlistment and allowing one day's pay and thirty cents for subsistence for

every twenty miles. Travel pay is not, however, allowed for sea travel, transportation on a government vessel with subsistence being furnished in lieu thereof. Allowances for travel are not given to soldiers discharged by way of favor, nor to those whose discharge is not honorable.

A soldier who has served as an enlisted man for thirty years may be retired upon his own application. He receives three-fourths of the pay allowed him by law in the grade held when retired, including re-enlisted and continuous service pay. Acting hospital stewards formerly received only the retired pay of privates, but it is now held, as already stated, that their detail as acting hospital stewards does not lapse upon discharge. No deductions are made except the monthly tax of twelve and one-half cents for support of the soldiers' home. In addition to their pay, retired soldiers receive \$9.50 per month as commutation for subsistence and clothing. They receive no commutation for fuel or quarters.

The uniforms of the corps consists of four suits: a uniform for ordinary wear, a suit for ward service, and two field uniforms.

The first (see Fig. 276) consists of a dark blue flannel blouse, lined, with five gilt buttons. The private wears on the left arm above the elbow a brassard of white cloth, three inches wide, with a cross of red cloth in the centre. The chevrons of the acting hospital steward consists of three bars of emerald-green cloth with a red cross within, the bars one-half inch wide, separated by white silk stitching, and worn above the elbows, in addition, an arc of green cloth over the ends of the bars. Service chevrons are worn on both sleeves below the elbow.

The collars worn are of white linen, the cravats of black silk, the gloves of white Berlin, and the shoes of calfskin.

The cap is similar to that worn by other enlisted men of the army—of dark blue cloth, with a visor of black patent leather rounded and sloping downward from the horizontal. The private and acting hospital stewards wear a cross of white metal on the front of the cap; the hospital steward a similar cross enclosed by a wreath of white metal.

The trousers are of light blue kersey with stripes of emerald green, the latter being one-half inch wide for privates, one inch for acting hospital stewards, and one and one-fourth inch for hospital stewards. The waist belt is of black leather, with plate.

The equipment for service with this uniform consists of the litter sling and the hospital corps or orderly pouch.

The sack coat and trousers of the uniform for ward service (see Fig. 277) are made of cotton duck, bleached for hospital stewards and acting hospital stewards, unbleached for privates.

For field service, in temperate climates, the blouse, shoes, waist belt, and trousers are the same as those of the ordinary uniform. Instead of the cap the campaign hat of drab-colored felt is worn, and the lower limbs from the knee down are protected by leggings of strong cotton duck (see Fig. 278). The overcoat is of sky-blue cloth,



FIG. 276.—Uniform for Ordinary Wear.

double-breasted, and with a detachable cape lined to conform in color with the facing on the uniform. The chevrons on the overcoat of the hospital steward are worn below the elbow with the point one-half inch above the cuff. The shoes are of russet leather. In the West Indies and the Philippines a blouse and trousers of brown cotton drilling or "khaki" are used instead of the woollen clothing. The brassard of the hospital steward and acting hospital steward chevrons are worn upon this blouse. Service chevrons are not worn. The arm of the service is denoted by shoulder straps of emerald green.

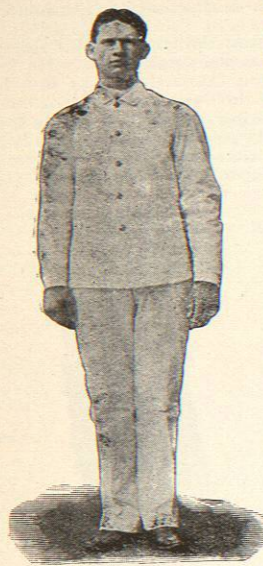


FIG. 277.—Uniform for Ward Service.

The equipment for field service of privates consists of the litter sling, canteen and strap, haversack and strap, with meat can, tin cup, knife, fork, spoon, and hospital corps pouch; when serving as orderly a medical officer's orderly pouch instead of the hospital corps pouch. The field equipment for non-commissioned officers is the same as for privates with the omission of the litter sling and hospital corps pouch. The following articles are contained in the orderly and hospital corps pouches.

CONTENTS OF ORDERLY POUCH.	
Ammonia spiritus aromaticus in flask with cup.....c.c.	60
Bandages, gauze, sterilized, No. 6	6
Case, pocket.....No. 1	1
Chloroform in case.....gm.	100
Catheter, Eng., rubber, in box.....No. 1	1
Diagnosis tags and pencil book.....No. 1	1
First-aid packets.....No. 4	4
Gauze, sublimated, 1-metre pieces.....No. 4	4
Jackknife with saw blade, No. 1	1
Ligatures, catgut, sterilized, three sizes.....pkgs.	6
Ligatures, silk, sterilized, three sizes.....pkgs.	6
Mist. chloroformi et opii, in case, fluid or tablets.....c.c.	30
Pins, common and safety, of each.....paper	1
Rubber bandage.....No. 1	1
Scissors.....No. 1	1
Splints, wire gauze for, in roll.....No. 1	1
Surgical plaster.....spool	1
Syringe, hypodermic.....No. 1	1

CONTENTS OF HOSPITAL CORPS POUCH.	
Ammonia spiritus aromaticus in flask with cup.....c.c.	60
Bandages, gauze, sterilized, No. 6	6
Case, containing pins, common and safety, scissors and dressing forceps.....No. 1	1
First-aid packets.....No. 6	6
Jackknife and saw blade.....No. 1	1
Rubber bandage.....No. 1	1
Splints, wire gauze for, in roll.....yd.	1
Surgical plaster.....spool	1

No side arms are worn, but revolvers or other available firearms may be carried when serving in the field during Indian wars, or when the rights of the hospital corps as non-combatants under the Geneva convention will not be recognized.

When on active service, the clothing of each man is rolled up in the shelter tent supplied to him and the roll is secured by straps. It is ordinarily carried in a wagon, but can be made fast behind the saddle when the man is mounted.

Blanket bags, or knapsacks, such as are used by the infantry, were formerly carried by the privates of the hospital corps. Their use has been given up for the reason that they could not be used by men on mounted service, and that when on foot the hospital corps private must be unencumbered by heavy weights because liable to be called upon at any time to render aid to the sick or wounded.

The moral and mental qualifications of the candidate for transfer from the line to the hospital corps are or should be known in advance by the medical officer. He should investigate personally in making the selection of men for transfer, for many company commanders oppose the transfer of good men on the ground that they cannot be spared, and are on the other hand not unwilling to rid themselves of men who have shown themselves unable or unwilling to learn or are otherwise objectionable. The hospital corps is a picked corps. Its members have higher responsibilities than privates of the line and are properly given higher pay. There is a danger that men will be attracted by the pay alone or by the notion that the work of the hospital corps private is easier than that which falls to the private of the line. The hospital corps private has, it is true, no guard duty to perform and when no severe sickness prevails is not hard worked. On the other hand, he is always on duty, and his care of the sick may involve protracted watching and much disagreeable and possibly dangerous work, to perform which in the proper spirit he should have a real love for his calling.

The transferred man of the line is well disciplined, familiar with the conditions of army life, and at home in field service. Good gardeners and clerks and handy men for out-of-door work are easily obtained by transfer. To secure good cooks in this way is not so easy. They are treasures with which the officers of the line are reluctant to part. On the other hand, men enlisted from civil life are generally better educated and are more apt to be attracted to the hospital corps because of fondness for study, natural aptitude for nursing, or interest in medicine or pharmacy. Very few men excel in all the departments of the work which the hospital corps man is called upon to perform, and the most useful hospital corps detachment is not necessarily that one in which all the members are most highly educated. There will always be need of hewers of wood and drawers of water. At the same time while specialization is necessary, it is essential that all hospital corps men should have a knowledge of nursing and of first aid, including litter and ambulance drills.

The Army Regulations provide that "members of the hospital corps will be instructed by a medical officer of the post for at least eight hours in each month. This instruction will consist of lectures and demonstrations in the methods of rendering first aid to the sick and wounded, and of drills in the ambulance service, and as litter bearers, in accordance with the drill regulations."

It was soon seen to be desirable that some of the soldiers of the line should participate in this instruction, and the Army Regulations of 1889 therefore directed that there should be four privates in each company designated for instruction as litter bearers. They were to be instructed at least four hours each month, together with all available men of the hospital corps, in the duties of litter bearers and the methods of rendering first aid to the sick and wounded, the object of this special instruction being defined to be "to insure the constant presence in each company of a number of men who can in emer-



FIG. 278.—Uniform for Field Service.

gencies render temporary aid to the sick and wounded of their organization, and to constitute a reserve or school of instruction from which the privates of the hospital corps can be drawn."

The effect of the presence of the company litter bearers at the lectures was naturally to lead to special prominence being given to first aid in the instruction of the members of the hospital corps, and the subject was generally treated from the purely military standpoint. This course of lectures was supplemented by lectures to members of the hospital corps (at hours when they alone were expected to attend) upon nursing and such other subjects as come especially within their province.

The lectures were illustrated by the free use of charts, blackboard sketches, and microscopic preparations, as well as by practical demonstrations, and generally proved interesting to the men of the corps and the more intelligent of the company bearers.

In 1896 it was decided to extend the benefits of this instruction to all enlisted men. The company bearers were done away with and the regulations were amended to provide that all enlisted men of the army shall be instructed by their company officers, for at least four hours in each month, in the duties of litter bearers and the methods of rendering first aid to the sick and wounded. That the officers may be prepared for this duty, the surgeon of the post is required to instruct all company officers serving with troops in the professional knowledge required. This instruction will, it is directed, consist chiefly of practical demonstrations, utilizing for this the prescribed drills of the hospital corps, especial attention being given to the instruction in first aid. These practical demonstrations are to include methods of arresting hemorrhage, of applying the dressings contained in the first-aid packet, of immobilizing a fractured limb, of resuscitating those apparently drowned, etc., and are supplemented by lectures designed to convey all essential information with reference to the anatomy of bones and blood-vessels; the causes and treatment of syncope and of heat exhaustion; the differential diagnosis and treatment of sunstroke; the rationale of the various measures of first aid to the sick and wounded, etc. Except so far as it leads to better instruction of the officers of the line in first aid, the plan above mentioned, which is still in force, is regarded as of doubtful utility. Unless an officer is especially interested in surgery and medicine, he can hardly be expected to acquire a sufficient comprehension of first aid from a few lectures to enable him to give instruction which will be of much interest and value. In the present connection the regulation above cited is of interest inasmuch as it defines officially the scope of the lectures upon first aid.

In addition to the formal lectures to the hospital corps, much is done in imparting information at the bedside and in the operating room and the laboratory and the dead-house.

Each post hospital is supplied with a library of standard medical books and some current medical periodicals, which the studious and careful hospital corps men are permitted to use in their leisure hours. The intelligent man who makes good use of his opportunities for reading and observation can soon qualify himself for promotion, or if he does not desire to remain in the army will find that his term of service has been a valuable preparation for the study of medicine.

Such a course of instruction as the one above outlined is the only one possible at ordinary posts when the detachment is small and every man is constantly on duty. With fairly ambitious, intelligent, and well-educated men much can in time be accomplished by it. But there are manifest advantages in a more rapid attainment of proficiency in the knowledge necessary for the members of the hospital corps, and it is desirable that men enlisted from civil life should be subjected for a term to a rigid military drill and the strict discipline of a large detachment to beget the habit of prompt unquestioning obedience which is the first requisite of the soldier. In order to receive such military training it was at first provided

that recruits for the hospital corps who had not had at least one year's service in the army should be attached for a year to a company stationed at one of several specified posts, and "be subject to all the drill and discipline required of privates in the organization to which they are attached."

This plan, which made no provision for instruction in the special duties of the hospital corps, was, however, soon given up, and in 1891 a hospital corps company was organized at Fort Riley, Kansas, on lines similar to that of companies of infantry with an allowance of eight non-commissioned officers (three hospital stewards and five acting hospital stewards). Soon afterward a second company of instruction was organized at Fort D. A. Russell, Wyoming. The Secretary of War authorized the transfer to these schools of men who had had only three months' service in the line. The time of the members of the hospital corps companies at these schools was fully occupied with drills, lectures, and various forms of practical instruction. The course was six months in length, but was extended to eight months in the case of men under instruction in pharmacy and clerical work. Very good results were obtained at these schools, but objection was made to their location on the ground of expense in matters of transportation, for the majority of the men who composed these companies were enlisted in the East, and after the completion of the course of instruction a considerable percentage were returned to the East again for duty. Accordingly the school at Fort D. A. Russell was given up in 1894 and a school was organized at Washington Barracks, District of Columbia. In 1896 the school at Fort Riley was also discontinued and the thirty privates there were distributed to several of the larger garrisons, generally those situated nearest to the headquarters of territorial departments, where they were given a course of instruction and kept as a reserve to fill vacancies in hospital corps detachments as they occurred. These posts are, with one exception, still authorized to maintain an increased number of hospital corps privates for the purpose above indicated, but the great demand for well-instructed men since the beginning of the war with Spain has made it impossible to leave privates under instruction for a sufficiently long period to obtain results of much value.

Systematic teaching in the hospital corps school of instruction at Washington Barracks was practically suspended during the war, not only because the time of the medical officers was so completely taken up by the care of the large number of patients in the general hospital which was established at that post as to leave them no opportunity for the giving of instruction, but also because the need of hospital corps men was so urgent in Cuba, Porto Rico, the Southern camps within the United States, and in the Philippine Islands, that time could not be spared for preliminary education. The school, therefore, became hardly more than a depot at which recruits were collected, uniformed, and sent to the front. With the return of more settled conditions the school was reorganized and expanded, and the course of systematic instruction was resumed. After the close of the war with Spain the large army collected in the Philippine Islands demanded extensive drafts of hospital corps men. Washington Barracks was selected as the rendezvous for recruits from the Eastern United States destined for that service, and a similar school was established at Angel Island at which hospital corps men enlisted in the West were collected and instructed before they were sent to Manila. The course of instruction in these schools was arranged with a view to especial preparation for Philippine service.

Since the conditions there have been such that women cannot live with safety at the interior posts, and since the number of small posts at which it would not be expedient to employ female nurses in any case is very large, it appeared especially necessary that members of the hospital corps should be familiar with the methods of preparation of food for the sick.

Instruction in cooking is therefore a prominent feature in the work of these schools. The immediate charge of