



The Role and Developmental Plan of the Emergency Medical Information Support Center (EMISC) by the Armed Forces Medical Command in South Korea



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The use of Army medical and/or other Army records in the preparation of this material is acknowledged, but is not to be construed as implying official Department of the Army approval of the conclusions presented.

Abstract

OBJECTIVE: The purpose of this poster is to describe South Korea's military Emergency Medical Information Support Center (EMISC).

METHODS: The mission, functions, and organization of the EMISC were reviewed from the time of inception to the present. Workload data was collected and analyzed.

RESULTS: The EMISC was organized in December 2006 to provide information about emergency medical treatment and capabilities of the evacuation system and medical facilities, so that it can prevent further disabilities of casualties and rescue lives in the battlefield and outside the battlefield. The functions of the EMISC are to unify the emergency military medical system, share civil and military medical information in real time, provide unified information about medical personnel and evacuation methods, and support the rare types of blood (Rh-). The EMISC has been in operation 24/7 since its inception. Before the center was opened, all information about the patient was reported to the chain of command, and the primary caregiver obeyed the commander's order. Now, in emergency cases, the primary caregiver can call the EMISC directly and obtain advice about treatment and information about evacuation methods and the ability of secondary caregivers (civilian/military). In total, 1,774 cases used the EMISC through March 2009. Various cases were supported from the EMISC, but there are a few limitations which interfere with the progress of the EMISC. The first and main limitation is that the primary caregivers think that the EMISC is acting as an additional dual-reporting system; so they hesitate to use the EMISC. Second, the EMISC has no binding power over the provider; so it simply provides information to the primary caregiver but can't function as a central control center.

CONCLUSIONS: The EMISC is being used as a valuable resource for the primary caregiver; however, it is not able to unify the military emergency medical system. If we remove the limitations, we can improve the EMISC by preventing further disabilities and rescuing lives during peace, natural disasters, or war.

Introduction

This poster introduces the Emergency Medical Information Support Center (EMISC) and analyzes its results.

The EMISC was organized as a necessity to unify South Korea's military emergency medical support system, to help with rapid treatment at the point of injury, and to enhance the efficiency of treatment in emergency cases whether on the battlefield or not.



Figure 1. Opening ceremony of the EMISC.

Methods

We obtained the data about the EMISC from South Korea's Armed Forces Medical Command. The missions, functions, and organization of the EMISC were reviewed, and the change of emergency medical system and the results were analyzed. Limitations and future plans for the EMISC were also identified in this study.

Results

The EMISC was organized to support information about emergency medical treatment and the ability of the evacuation system and medical facilities, so that it can prevent further disabilities of casualties and rescue the lives in the battlefield and the non-battle field. The center was demonstratively opened in December 2006 and held a formal opening ceremony in May 2007 at the Armed Forces Capital Hospital in South Korea.

The functions of the EMISC are to unify the emergency military medical system, share civil and military medical information in real time, provide a unified information of medical personnel and evacuation methods, and support the rare types of blood (Rh-).

The EMISC consists of three teams of emergency medical doctors, nurses, executive officers, and medics. These teams cover all days in turns.

Before the center was opened, all information about the patient was reported to the chain of command, and the primary caregiver obeyed the commander's order. With the EMISC, the primary caregiver can call the EMISC directly and obtain advice about treatment and information about evacuation methods and the ability of secondary providers (civilian or military).

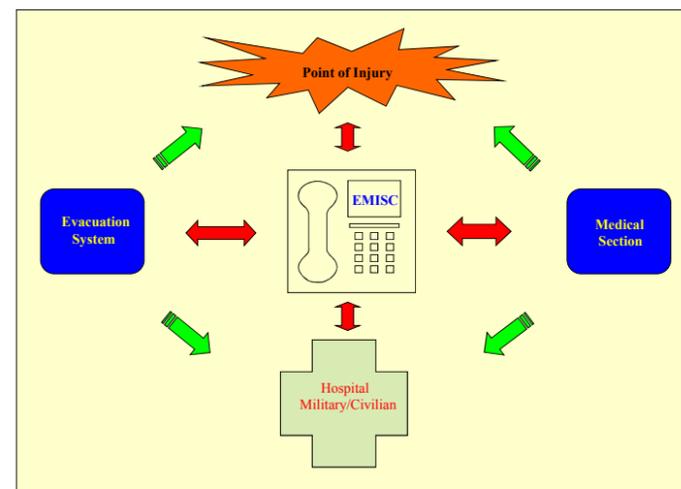


Figure 2. Functional diagram of the EMISC.

Notably, the EMISC provides information about a rare type of blood, so that it can connect patients in need with supplies. The EMISC has provided 13 cases of blood to date.

Results (continued)

Year	Number of cases that received actual support from the EMISC, by type of support			Questions for the center	Others	Total number of cases
	Consultations for treatment	Evacuation of patients	Rare types of blood			
2007	77	193	4	297	282	853
2008	75	175	8	166	275	699
2009* (estimated)	18 (72)	41 (164)	1 (4)	64 (256)	98 (392)	222 (888)
Total number of cases	170	409	13	527	655	1,774

Table 1. Number of cases supported by the EMISC

*Figures in parentheses refer to the estimated number of cases for 1 year because cases were collected through March 2009 only.

In total 1,774 cases used the EMISC through March 2009 (27 months). We divided all cases according to yearly use and purpose for using the EMISC.

In the first year, consultation cases for treatment were 77, evacuation of patients were 193, support for rare type of blood were 4, questions for the center were 297, and others were 282. The total number of cases in 2007 was 853. The number of cases that received actual support was 274 and comprised 32.1% of the total cases.

In the second year, consultation cases for treatment were 75, evacuation of patients were 175, support for rare type of blood were 8, questions for the center were 166, and others were 275. The total number of cases in 2008 decreased to 699. The number of cases that received actual support increased in 258, and it comprised 36.9% of the total cases. Thus, actual use of the EMISC increased.

In the third year, consultation cases for treatment were 18, evacuation of patients were 41, support for rare type of blood was 1, questions for the center were 64, and others were 98. The total number of cases in 2009 was 222. The number of cases that received actual support was 60, and it comprised 27.0% of the total cases. Because the data was collected up to March 2009, we used estimated data converted by 4 times as shown on table 1 and figure 3.

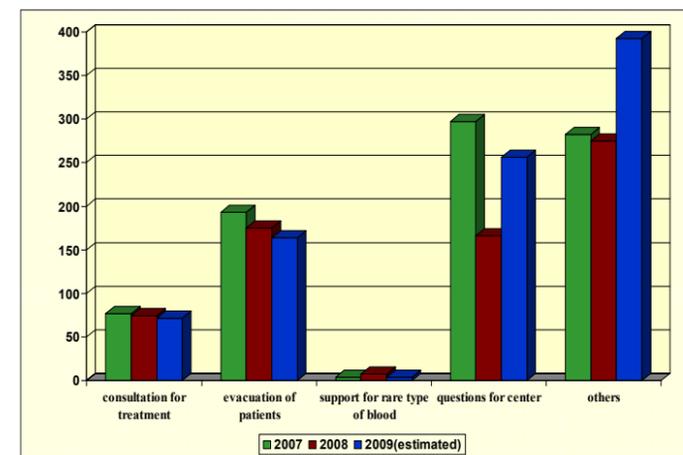


Figure 3. Comparison of cases supported by the EMISC.

Results (continued)

The number of consultations for treatment and evacuation of patients gradually decreased. However, the total number of calls increased. The largest increase was in the number of questions that the EMISC received.

There are a few limitations that are slowing the progress of the EMISC. The first and main limitation is that the primary caregivers view the EMISC as an additional dual-reporting system; thus, the primary caregivers hesitate to use the EMISC. Second, the EMISC has no binding power over the decision-maker; so it just provides information to the caregiver and can't act as a central control center.

Conclusions

The EMISC should make an effort to establish a public information strategy, unify the emergency military medical system to remove limitations, and enhance its functional abilities.

The EMISC coordinates care for almost 850 patients every year, providing information about emergency treatment and evacuation. The EMISC has contributed enormously to unifying the emergency military medical system, real-time sharing of civilian and military medical information, providing unified information of medical personnel and evacuation methods, and supporting the rare types of blood (Rh-).

But barriers remain because caregivers think that the EMISC is acting as an additional dual-reporting system and that it is not acting as a central control center. The EMISC can potentially prevent further disabilities of casualties and rescue lives in the battlefield. Significant changes are required to establish the EMISC as the single source of public information and to create a fully operational emergency military medical system.

Acknowledgments

We would like to thank Beomman Ha for his help in collecting data.

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