

A Study of Fire-Arm Injuries in District Haripur, Pakistan

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ABSTRACT

Objective: Study of firearm injuries of cases brought and treated at DHQ Teaching Hospital Haripur to know rate of morbidity, mortality and full recovery.

Study Design: Original study.

Place and Duration of Study: This study was conducted at the District Headquarter Teaching Hospital, Haripur from 1st Jan, 2009 to 31st Dec, 2010.

Materials and Methods: All living victims of firearm injury brought and admitted in DHQ Hospital Haripur in during this period were included in this study, ward records, police investigation reports and discharge reports were made part of this study, Performa were made and filled directly from these reports.

Results: A total 110 victims of firearm injuries were admitted and treated in DHQ Hospital Haripur from 1st Jan, 2009 to 31st Dec, 2010. Most affected age group was 10 to 30 years (70%), male to female ratio was 9:1. Victims from rural area were 65% while 35% were from urban areas. Most affected body region was Abdomen & Pelvis. Full recovery occurred in 74.54% cases, some degree of disability occurred in 13.63% and death occurred in 8.18% cases.

Key Words: Firearm, High velocity rifled firearm, amputation, Entry & Exit wounds.

INTRODUCTION

Firearm weapons are used mostly for committing Homicide⁵ and Suicide¹⁷ all around the world. Homicide generally means "Killing of a human being by the conduct of another human being" and suicide means "Intentional self-killing". The firearm weapons cause grievous and fatal injuries that is why these are commonly used for homicidal deaths and injuries. No place on this planet is totally free from firearms. The reasons for wide spread use of firearms to commit homicide and suicide are;

1. These cause damage to the vital organs like brain, heart, lungs and liver which cause, most probably, death.
2. Firearms can be used from a distance so that the safety and escape by the assailant from the crime scene is ensured.
3. The victim has little time to reach the hospital because of massive hemorrhage that usually causes death in short period of time, even if the victim reaches the hospital the treatment to save life is limited as it needs facilities and skilled trauma surgeons that are not available in every hospital.

Firearms were first produced in China by the great Mongol emperor Gingiz Khan about 1000 years ago and since then there has been consistent progress and development in this field improving the efficacy regarding effective range, lethal physical damage at the target (human body) and the speed & mechanism of action. Now-a-days the commonly available small firearm weapons

include manually operated, semi-automatic and fully automatic firearm weapons like single & double barreled shotguns, repeater shotguns, klashinkov & kalakov sub-machine guns, assault rifles, pistols and revolvers.

The use of firearms has increased highly throughout the world specially in the 3rd world countries of Africa, South America and South East & Far East Asia where small firearms reached in large scale supplied by foreign powers to various rebellious groups which serve their bested interests in the name of so called independence and separatist movements, Foreign powers like USA and Ex USSR played crucial role in flooding 3rd world countries with small firearms to destabilize them and control their resources.

MATERIALS AND METHODS

This study was conducted at DHQ Hospital Haripur which is also teaching hospital for Abbottabad International Medical College, Abbottabad (AIMC). The study was carried out by the department of Forensic Medicine of AIMC. All victims of firearm injuries admitted in the hospital from Jan 2009 to Dec 2010. (Total of 110 cases) were admitted during this period and were made part of this study. Hospital record of medico-legal reports, treatment provided in the hospital, police investigation report, resulting morbidity and mortality reports and follow up of the cases, constituted material for the study Performa were designed to record Date, Day & Time of injury, arrival in hospital, type of injury, number of injuries, body region involved, number entry of and exit wounds, type

of firearm weapon, place of crime scene, medical treatment given and outcome of the treatment.

RESULTS

A total number of 110 cases of firearm injuries were studied who were admitted to surgical, orthopedic and medical wards, they comprised of 99 male and 11 female victims so the male to female ratio was 9:1 (Table – 1). Age of the victims was from 10 to 66 years (Table – 2) most affected age group was 21 – 30 years (40%) followed by 10 – 20 years (30%), 31 – 40 years (20%), 41 – 50 years (5.45%), 51 – 60 (2.7%) and 61 – 70 years (1.8%). Majority of the victims were brought from rural areas of district Haripur (65%); 24 cases from Khanpur (21.8%), 21 cases from Kot Najeibullah (19.09%), 12 cases from Seri Kot (10.9%). While the rest 35% cases were brought from urban areas of Haripur. Sites (region) of firearm injury on the body (Table – 3) were; Abdomen & Pelvis 57 cases (51.8%), chest 30 cases (27.27%), Extremities 12 cases (10.9%), Head & Neck 3 cases (2.72%) and multiple regions involved 8 cases (7.27%). High velocity firearms were used in 90% cases, shotguns in 8% cases and explosives used in 2% cases. Homicidal assaults were reported in 77 cases (70%), attempted suicide in 5 cases (4.4%), self-inflicted fabricated injuries in 2 cases (1.8%), accidental cases were 9 (8.9%) and 16 cases (14.54%) remained unknown.

Table No.1: Gender based firearm injuries and percentage

S. No	Gender	No of Cases	Percentage
1	Male	99	90%
2	Female	11	10%

Table No.2: No and percentage of various age groups of the victims of Firearm injuries

S. No	Age in Years	No of Cases	Percentage
1	10 – 20	33	30%
2	21 - 30	44	40%
3	31 – 40	22	20%
4	41 – 50	06	5.45%
5	51 – 60	03	2.72%
6	61 – 70	02	1.8%

Total firearm wounds were 314 (Table – 4) out of which entry wounds were 186 (59.23%) and exit wounds were 128 (40.76%). Single entry wounds found in 60 cases (54.6%), two entry wounds found in 28 cases (25.45%), three entry wounds recorded in 18 cases (16.36%) and four entry wounds in 4 cases (3.63%). In 24 cases no exit wound found (21.8%), single exit wound in 52 cases (47.27%), two exit wounds in 28 cases (25.45%), three exit wounds in 4 case (3.63%) and four exit wounds in 2 cases (1.8%). All 110 cases were admitted to hospital and required medical treatment given in time, in spite of reasonable medical care death occurred in 9 cases (8.18%),

complete recovery recorded in 82 cases (74.54%), some degree of disability resulted in 15 cases (13.63%) and fate of 4 cases could not known since they could not be treated (3.63%).

Table No.3: No and percentage of firearm injuries on various body regions

S. No	Body Region	No of Cases	%age
1	Head and Neck	03	2.72%
2	Chest	30	27.27%
3	Abdomen and Pelvis	57	51.8%
4	Extremities	12	10.9%
5	Multiple Sites	08	7.27%

Table No.4: No of cases and percentage of Entry and Exit Firearm wounds

S. No	Wound	No of Cases	%age
1	Single Entry Wound	60	54.6%
2	Two Entry Wounds	28	25.45%
3	Three Entry Wounds	18	16.36%
4	Four Entry Wounds	04	3.63%
5	No Exit Wound	24	21.8%
6	Single Exit Wound	52	47.27%
7	Two Exit Wounds	28	25.45%
8	Three Exit Wounds	04	3.63%
9	Four Exit Wounds	02	108%

Table No.5: Outcome of medical care No and percentage

S. No	Fate	No of Cases	%age
1	Death Occurred	09	8.18%
2	Disabilities	15	13.63%
3	Complete recovery	82	74.54%
4	Unknown	04	3.63%

DISCUSSION

Pakistan is placed among the countries having high rate of homicide¹⁸ by use of firearms. Some of the reasons for preferred use of firearms are;

1. Easy availability of variety of manual, semi-automatic and automatic firearm weapons in the local market.
2. Availability of firearm weapons and their ammunition at affordable cost.

Both the above mentioned factors are the direct result of mass influx of Afghan refugees into Pakistan in early 1980s and the armed conflict & civil war in the neighboring Afghanistan.

3. Relatively lenient Govt policy regarding issuance of the license for firearms.

4. Rising intolerance in the society has increased sudden provocation over pity issues. Firearms are

frequently used for homicide in disputes of property, family feuds, enmity running from generations and in terrorist attacks. The most frequently used firearm weapons are high velocity rifled firearms (rifles, pistols and revolvers). Measures can be taken to control and minimize firearm weapons through proper legislations¹⁴.

On the national level, in Pakistan, the Russian made Klashnikov rifle (in fact a sub-machine gun) was first introduced in late 80s soon after the Russian invasion of Afghanistan. The gun reached every nook & corner of the country since then and now hardly any place in Pakistan is free from this deadly weapon. Moreover Ex Government of Pakistan also contributed in the large scale spread of this weapon by issuing its licenses to the civilian population in large number. The deadly firearm weapons influx in Pakistan was one of the consequences of so the called war on terror and civil war in the neighboring country Afghanistan. The weapons are smuggled by Afghan refugees and arms smugglers operating on the Pak-Afghan border.

Traditionally Khyber Pakhtun Khwa and Federally Administered Tribal Areas (FATA) were famous for possession and use of firearms but it is talk of the past now since variety of deadly firearms have reached Punjab, Sindh and Baluchistan in large scale. The recent police operation in Karachi was countered by civilians through the use of rocket launchers, grenade attacks besides klashnikov firing. The rate of homicide by firearm is 90% in Peshawar³ which is almost the same as in Faisalabad¹⁸, Lahore⁶ and Karachi¹⁰.

On international level the rate of homicide¹⁸ by ranges from less than 1 per 100,000 of population per year to 15 per 100,000 of population per year, for example in Egypt, England, UAE and Qatar it is less than 1 to 1 per 100,000 of population per year while it is 6 to 15 per 100,000 of population per year in USA, Mexico and Columbia¹⁸. So Haripur being 7 per 100,000 population per year is among the high rate of homicide by firearms.

CONCLUSION

Firearm weapons are the most commonly used weapons for homicide and suicide beside accidental firearm injuries. Firearm injuries are dangerous and lethally grievous injuries which makes the firearm weapons as ideal weapons for committing homicide and sometimes suicides. The increasing trend of using the deadly firearm weapons needs to be controlled and this can only be done through a joint, co-ordinated and effective collective efforts by various sections of the society. Universities, Schools and Madrasahs can deliver much by preaching the right conduct of life in line with injunctions of Islam and humanity, by condemning hate, by discouraging spread of hatred and violence, by guiding people to resolve their disputes through

peaceful means of dialogue and negotiations based on our religion and traditions. We need to improve our police and other security agencies by introducing new technologies and modern methods of investigations. We need to develop trauma centres in each Tehsil level hospitals beside providing training to trauma surgeons at our postgraduate medical institutions so that the firearm victims are given prompt and effective medical treatment immediately without wasting any time.

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