**Introduction**

Injury mortality is a global health concern
- 5 million die from injuries worldwide annually
- 90% of road traffic deaths occur in developing countries
- Injury deaths in East Africa increased by 51% from 1990 to 2010
- Trend partly due to rapid urbanization and motorization

Kigali, Rwanda
- One of the fastest growing cities in the region
- Despite growing perception of injuries, magnitude of problem is unknown

**Aim**

To describe the epidemiology of injury-related deaths at the main tertiary public hospital in Kigali, Rwanda

**Methods**

Database created for all deaths occurring at a major university hospital over 12 months (Jan-Dec 2012)
- Hospital records reviewed for demographics, diagnoses, mechanism of injury, date and cause of death

Descriptive statistics

**Results**

Injury accounted for 16.0% out of 1,019 deaths (163 cases)
- 74.1% were male
- Median age 31 years

Head injury was the most common cause of death overall (60.8%)

<table>
<thead>
<tr>
<th>Age group</th>
<th>N (%)</th>
<th>Most common cause of death (%)</th>
<th>2nd common cause of death (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Adults ≥ 18 years</td>
<td>715 (70.2%)</td>
<td>Head injury (64.1%)</td>
<td>Burn (4.3%)</td>
</tr>
<tr>
<td>Youths 5-18 years</td>
<td>74 (7.3%)</td>
<td>Head injury (68.0%)</td>
<td>Burn (20.0%)</td>
</tr>
<tr>
<td>Children &lt; 5 years</td>
<td>200 (19.6%)</td>
<td>Burn (47.6%)</td>
<td>Head injury (38.1%)</td>
</tr>
<tr>
<td>Unknown age</td>
<td>30 (3.0%)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>1019 (100%)</td>
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</tbody>
</table>

Road traffic injury was the most frequent mechanism (33.1%)

Majority of injury deaths occurred in the emergency department, and 73.7% of these died within 24 hours of presentation

**Conclusions**

Head injury and road-traffic crashes account for a substantial burden of deaths in Kigali Injury

Injury deaths occur largely in men

Majority patients die within 24 hours of initial presentation to hospital

**Limitations**

Hospital records contain inconsistent information across ward
- Possible underreporting of case volume
- Many diagnoses or mechanisms of injury unknown
- Single hospital study, no information on prehospital deaths

**Implications for Policy**

Severe need to improve hospital record keeping to improve data quality
- Training in death certification and cause of death reporting
- Centrally organized mortality statistics system

Injured patients need better management in pre-hospital and emergency ward settings
- Need to review existing prehospital emergency care
- Implement triage system in emergency ward to identify high acuity patients

**Acknowledgement**

We thank the nursing staff and data managers at Centre Hospitalier Universitaire de Kigali for their support and information sharing.
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