GROUP 2

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Time Series Analysis of Acute Abdomen Outcomes and Associated Cost Payment: a Ten-Year Brazilian Nationwide Study

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10-Year Time Series Analysis (2010-2019)

Data obtained from the DATASUS public registry, maintained by the Brazilian Ministry of Health

Cases were selected as urgent or emergent admissions under ICD-10 codes K25-27, K35-38, K40, K57, K80-81, K85-86, R10

- Trends in healthcare outcomes and associated costs are essential for planning of public health policies.
- In developing countries, disparities in surgical healthcare access constitute additional challenges and can lead to worse outcomes.

Number of acute abdomen **hospitalizations** per 100.000 inhabitants	Trend 1.20 (0.10 – 2.40)
Mortality due to acute abdomen per 100.000 inhabitants	Trend 0.08 (0.04 –0.12)
Mean **length of hospital stay** per acute abdomen admission	Trend 0.12 (0.07 – 0.18)
Mean total **cost paid to the hospital** by the public system per acute abdomen admission, expressed in Brazilian reais (R$), adjusted for yearly inflation indexed at 2010 calendar year	Trend -7.60 (-9.60 – -5.60)

*Linear trends are based on regression models with linear and quadratic parameters.

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- These results suggest an increased burden of acute abdomen admissions over the study period and worse outcomes, in a context of reduced payment for public health services in Brazil.

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The Cost of Not Wearing a Helmet

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Retrospective review of motorcycle riders using the NTDB 2016-2017

30.6%

reported no helmet use
(N = 427)

Mean Face AIS

Helmeted 1.28
Unhelmeted 1.41
(*p=0.16*)

Unhelmeted motorcycle patients

1.9x

likely to have CT face
(*Relative Risk, p<0.05*)

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