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Does a Brief Educational Intervention Allow for Greater Prehospital Recognition of Acute Stroke by Paramedics?.

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Does a Brief Educational Intervention Allow for Greater Prehospital Recognition of Acute Stroke by Paramedics?

BACKGROUND

- Identification of candidates for acute stroke therapy in the prehospital setting has potential to reduce time to treatment and increase acute stroke interventions
- Purpose of this trial was to determine if a brief educational intervention for prehospital providers would increase identification of stroke victims without compromising the accuracy of stroke alerts called in the field

METHODS

- This was a prospective before and after study.
- An 8 hour didactic and scenario-based class was presented to 25 full time and 15 part time paramedics to one service with approximately 16,900 calls per year
- The total number of prehospital stroke alerts called by this cohort was compared to the stroke alerts called by the same ambulance service prior to the educational intervention.



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RESULTS

- Mean number of stroke alerts increased from 2 to 3.4 per month, p<.0001.
- to 71%, p>0.2.
- IV TPA use increased from 50% to 54%, p>0.6.



Stroke Alerts per Total Number of 911 Calls

Accuracy of Stroke Alerts Pre and Post



True Strokes as a Percentage of Stroke Alerts

Number of alerts determined to represent true stroke increased from 63

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% Non-hemorrhagic Strokes Receiving TPA

- remained constant





CONCLUSIONS

 An educational intervention that emphasized early stroke recognition doubled the rate of prehospital alerts

• The proportion of patients correctly identified as stroke and the proportion of patients receiving intravenous lytic therapy or endovascular reperfusion

 An educational intervention directed at paramedics increased the absolute number of therapeutic interventions

