Interview Guide – Taxi Drivers

Taxi-based EMS for Developing Countries
Semi-structured interview guide: Taxi Drivers

Date:

Start Time:       End Time:

Location:

Interviewer(s):

_________________________________________________________

1) What type of vehicle have you been using in your work? (3 or 4 wheeler)
2) Who owns the vehicle?
3) How long have you been working as a driver?

Questions

[If asking for anecdote: Could you start by telling me about your experience with transporting people who have been injured in road traffic accidents? ]

Driver's history with crash victim transport
Let me start by asking you about your overall experience with transporting people who have been injured in road traffic accidents.

1. Have you ever transported people who have been injured in a road traffic accident to a hospital? (IF ANSWER IS NO, GO TO QUESTION 10)
   a. When was the first time you transported a traffic accident victim?
   b. Since then how many crash victims have you transported?
   c. Out of those victims, approximately how many were in a serious condition?
      i. Do you recall any victims who were in a serious condition? Were any of them bleeding heavily or unconscious? How commonly does that happen?

Crash Scene Environment, Hospital choice and Hospital interaction
Now, I want to ask you about what happens at the crash scene and at the hospital.

2. Please tell me about what typically happens at the crash scene.
   a. How is the crash scene managed?
      i. Does a certain person or group take the lead?
   b. Who usually decides that a taxi/auto should transport the injured person?
   c. Who usually helps you to load the patient into the taxi/auto?
Interview Guide – Taxi Drivers

i. Does this change if the patient is unconscious or otherwise seriously injured? What about if they might have a head/neck injury?
d. Does anyone accompany you to the hospital?
i. If nobody comes with you, does that change how you act?

3. How do you decide which hospital to take the injured persons? (Probe: What is the role of the patients or their families in the decision? Other bystanders? Police?)

4. I want to ask you some questions about your experience at the hospital. Can you describe what usually happens when you bring the patient in? What happens at the hospital?
a. Who do you interact with? (Probe: what about police, doctors/nurses, other staff?)
b. Do you have to provide your contact information to anyone?
c. What happens if the hospital decides to turn away the patient? Why do you think the hospital would decide to do this?
i. Do you ever have to take patients to another hospital because the first hospital refused to take the patient? What does the hospital say when they refuse a patient?
d. How much time do you typically spend at the hospital?

Facilitators and Barriers to Taxi/auto Drivers Transporting Crash Victims
I would like to ask you a few questions about what encourages or discourages you from transporting patients to the hospital.

5. What are some of the reasons that you transport someone after a crash?
a. What are some of the benefits of using taxi-autos to transport patients?
b. How do you think it compares to other methods of transportation?
c. In your experience, have you faced any problems or difficulties in transporting patients by taxi/auto?

6. Do you ever choose not to transport an injured person? If so, what are some reasons for this? (Probe: Injury severity, type of vehicles involved, etc.)

7. Do you get paid or other compensation for transporting injured people to hospital? If so, from whom?

8. I am now going to ask you some questions on the legal aspects of transporting patients.
a. Have you had to interact with police after you have dropped off an injured person?
b. If so, has this led to your being asked to participate in a legal case?
c. What is your experience with that process?
d. Do you know if you are protected from being blamed for any harm that may happen to the patient while you are taking them to hospital?
Interview Guide – Taxi Drivers

e. Are you aware of legal protections for bystanders who help injured persons that have come about in the last few years (Probe: Good Samaritan guidelines?)

Now, I am going to ask you some questions about what you think other taxi/auto drivers consider when making a decision to transport an injured person.

9. In your opinion, what are the reasons that lead to a taxi/auto driver volunteering to transport injured victims?
10. Why do some taxi/auto drivers not transport patients?
11. In your opinion, what would encourage you and other taxi/auto drivers to transport injured victims?
12. What are the changes that you would like to see in the overall system of how injured patients are transported to hospitals?

Opinion about coordinated taxi/auto-based EMS?
One of the goals of our project is to see if it would be possible to make a system to coordinate the transport of accident victims to hospital by taxi/autos using a smartphone app. The system would work as follows. A group of taxi/auto drivers will be provided with smartphones containing the app and basic first aid training. When an emergency call is received and no ambulance is available, the taxi/auto driver who is closest to the crash site will be contacted through the app and asked to provide transport. The app will provide navigation to the crash site and then onward to the closest hospital participating in the system. At the hospital, the driver will be paid for their effort using mobile-to-mobile cash transfer.

13. What do you think of such a system?
   a. What do you think are possible benefits of such a system?
   b. What concerns do you have about the system? (Probe: Do you worry that your contact information will be recorded by the system?)
   c. Another option is to have a simpler system in which all taxi/auto drivers are simply paid about Rs 500 for bringing an accident victim to hospital with no questions asked. What do you think about that system?

14. Would you be willing to participate in testing the smartphone app?

ALTERNATE
Opinion about coordinated taxi/auto-based EMS?
One of the goals of our project is to see if it would be possible to make a system to coordinate the transport of accident victims to hospital by taxi/autos using a smartphone app. Do you think taxi drivers should transport patients from crash scenes? Why or why not?

I am now going to describe the idea that we are considering. A group of taxi/auto drivers will be provided with smartphones containing the app and basic first aid training. When an emergency call is received and no ambulance is available, the taxi/auto driver who is
Interview Guide – Taxi Drivers

closest to the crash site will be contacted through the app and asked to provide transport. The app will provide navigation to the crash site and then onward to the closest hospital participating in the system. At the hospital, the driver will be paid for their effort using mobile-to-mobile cash transfer.

1. What do you think of such a system?
   a. What do you think are possible benefits of such a system?
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   c. Another option is to have a simpler system in which all taxi/auto drivers are simply paid about Rs 500 for bringing an accident victim to hospital with no questions asked. What do you think about that system?

2. Would you be willing to participate in testing the smartphone app?
Interview Guide – Medical Staff

Taxi-based EMS for Developing Countries
Semi-structured interview guide: Medical Staff

Date: 
Start Time:      End Time: 
Location: 
Interviewer: 

Organization: 
Title: 

Questions

1. How long have you been with this institution?
2. How did you start working in the emergency department/casualty ward?

Current situation with patient transport & medical concerns
Let me start by asking you about how victims are brought to your hospital and the medical concerns when the transport is by lay people

1. How are patients most commonly brought to the hospital?
2. How often do you think they are brought in by auto/taxi drivers?
3. How are the more seriously injured patients generally brought to the hospital? (Probe: ambulance, police, auto/taxi, private vehicle)?
4. How are the less seriously injured patients generally brought to the hospital? (Probe: ambulance, police, auto/taxi, private vehicle)?

Let’s discuss the role of auto/taxi drivers in bringing in patients to the hospital.

5. Do you have any specific medical concerns about the patients who are transported by auto/taxi drivers? (Probe: Do you think patients who are transported by autos/taxis rather than ambulances may have more risk of medical complications? Can you give examples of such complications?)
6. What do you think are the concerns of auto/taxi drivers in transporting patients?
   a. What encourages them and what discourages them to transport injured victims?
   b. How do you think they are making decisions about where to take the victim? (Probe: bystanders at the scene, police, presence of police at the hospital, etc.)
**Interview Guide – Medical Staff**

**Taxi-based EMS**

**Decision to accept trauma victims**

Now, I want to ask you about the consideration of hospitals in accepting or turning away trauma victims.

7. **What usually happens when a victim arrives at the hospital?** (Probe: registration, first aid, referral to another facility)
   a. From the hospital side, who performs these various procedures?
   b. Do these processes change if the victim has a very serious injury?
   c. Who manages these procedures on behalf of the patient? Who will manage these if there is no accompanying individual?

7. **How often would a patient be referred to another facility?**

8. **What are the most common reasons for referral?** (Probe: financial constraints, lack of beds, medical expertise and equipment considerations, medico legal considerations, patient/family preference)

9. **Thinking of other hospitals outside of your own, are there hospitals that do not accept trauma victims? If so, why?** (Probe: Public/Private, monetary considerations, medical expertise considerations, medico legal considerations)
   a. How would the presence of police and relatives affect the referral decisions taken by the hospital?

**Medico Legal Issues**

I would like to ask you about the medico-legal processes involved when the hospital receives a trauma patient.

10. **What are the medico-legal processes involved when a victim is brought to the hospital?** (Probe: Severity of the case; For instance, that a pedestrian who become unconscious after being struck by a car is brought by a auto/taxi to the hospital. What are the medico-legal processes that the hospital will need to undertake in addition to providing medical care?)
    a. Are there any instances when a road traffic accident case might be recorded as something else? If so, could you tell us more about these cases?
    b. Who at the hospital is responsible for medico-legal processes?
    c. Are these processes different if the victim is brought by police or ambulance versus a bystander or auto/taxi driver? (Probe: specific medico-legal problems faced by auto/taxi drivers)
       • Can you explain how they are different?
       • Are there any specific medico-legal problems that the auto/taxi drivers might face?

**Opinion about coordinated taxi-based EMS?**

11. One of the goals of our project is to see if it is possible to build a system to network and coordinate autos/taxis to transport accident victims from the crash site to the hospital, navigated by a smartphone app. The system would work in the following way. A group of auto/taxi drivers, trained in basic first aid, will be provided with smartphones containing the app. When an emergency call is received at the control center and no ambulance is available, the auto/taxi driver who is closest to the crash site will be contacted by the authorities (e.g. Police) through the app and asked to provide transport. The app will provide navigation to the crash site and then onward to the closest hospital participating in the system. At the hospital, the driver will be paid for their effort using mobile-to-mobile cash transfer.


12. What do you think of such a system?
   a. What do you think are the possible benefits of such a system? (Probe: time, cost)
   b. What concerns do you have about the system? (Probe: Are you concerned that only traffic accident victims will be transported by the system and not victims of other emergencies? Coordination with ambulances and the police?)
   c. Another option is to simply pay Rs 500 to any auto/taxi driver bringing in a victim to a hospital. There would be no network or app. What are your thoughts on such a system?

ALTERNATE

Opinion about coordinated taxi/auto-based EMS?

One of the goals of our project is to see if it would be possible to make a system to coordinate the transport of accident victims to hospital by taxi/autos using a smartphone app. Do you think taxi drivers should transport patients from crash scenes? Why or why not?

I am now going to describe the idea that we are considering. A group of taxi/auto drivers will be provided with smartphones containing the app and basic first aid training. When an emergency call is received and no ambulance is available, the taxi/auto driver who is closest to the crash site will be contacted through the app and asked to provide transport. The app will provide navigation to the crash site and then onward to the closest hospital participating in the system. At the hospital, the driver will be paid for their effort using mobile-to-mobile cash transfer.

1. What do you think of such a system?
   a. What do you think are possible benefits of such a system?
   b. What concerns do you have about the system? (Probe: Do you worry that your contact information will be recorded by the system?)
   c. Another option is to have a simpler system in which all taxi/auto drivers are simply paid about Rs 500 for bringing an accident victim to hospital with no questions asked. What do you think about that system?

2. Would you be willing to participate in testing the smartphone app?

This concludes the interview. Thank you for your time.
Taxi-based EMS for Developing Countries
Semi-structured interview guide: Legal Experts

Date:

Start Time:      End Time:

Location:

Interviewer:

____________________________________________________________

Organization:

Title:

____________________________________________________________

Questions

1. How long have you been with your current organization?
2. How did you come to be involved with road safety?

Legally Protections & Liabilities for layperson transport
In India it is common that a person injured in a road traffic crash is transported to the hospital by a auto/taxi or a passing private vehicles. I would like to ask you about the legal issues related with transport road traffic crash accidents by private citizens.

1. Could you tell me about the legal protections that private citizens are exposed to when they transport victims of road traffic accidents to the hospital?
2. What are some of the legal vulnerabilities for private citizens when they transport victims of road traffic accidents?
3. What are the laws, regulations, and practices that influence the protections and liabilities of private citizens that choose to transport a road traffic accident victim? (Probe: Good Samaritan guidance from the Supreme Court, Law Commission of India, Motor Vehicle Act etc.)
4. Could you describe the Supreme Court guidelines for Good Samaritans and how it affects the legal protections for private citizens that choose to transport a road traffic accident victim?
5. How do the legal issues as they relate to transport of accident victims by individuals vary across states in India?

Thinking specifically about auto/taxi drivers,
6. Are there protections and liabilities that specifically affect auto/taxi drivers who transport injured victims to hospital? If so, what are these?
7. What are the legal consequences for auto/taxi-drivers who chose to transport? (Probe: license suspended, criminal penalties, fines)
Interview Guide – Legal Experts

8. Do auto/taxi-drivers have to appear before the Motor Accident Claims Tribunal? If so, can you describe their typical involvement in this process?

9. How do the different types of auto/taxi ownership structures impact legal protection?
   (Probe: independently owned auto, independently owned taxi, group ownership, contract with Uber/Ola, etc)

Medico-legal aspects

Now, I would like to ask you about the medico-legal issues that relate with transport of crash victims by auto/taxi drivers.

10. What is the legal basis for the medico-legal practices that are undertaken when a hospital receives an injured victim?

11. Do the medico legal practices at hospitals vary across the country? If so, how?

Position of actors relative to layperson transport

We were talking about the actual practices and laws for layperson transport. Now we are going to talk about groups, institutions or organizations that are concerned with this issue at the policymaking and legal level.

12. What organizations or groups have a stake in the issue of how accident victims are transported to the hospital, and what are their positions on this topic? (Probe: auto unions, taxi unions, medical groups, civil society, NGOs, academic institutions, government)

13. Are there groups that specifically oppose giving legal protections to auto/taxi drivers to transport patients? Who supports it?

Opinion about coordinated taxi-based EMS?

One of the goals of our project is to assess if it is feasible to build a system to coordinate the transport of accident victims to hospital by taxis using a smartphone app. The system would work as follows: A group of auto/taxi drivers will be provided with smartphones containing the app and basic first aid training. When an emergency call is received and no ambulance is available, the auto/taxi driver who is closest to the crash site will be contacted through the app and asked to provide transport by the control room authorities (eg. Police). The app will provide navigation to the crash site and then onward to the closest hospital participating in the system. At the hospital, the driver will be paid for their effort using mobile-to-mobile cash transfer.

14. What do you think are possible benefits of such a system?

15. What concerns do you have about the system?

16. Can you think of any legal implications of such a system? (Probe: How does Good Samaritan law apply to such a system)

17. Another option is to have a much simpler system in which all auto/taxi drivers are simply paid about Rs 500 for bringing an accident victim to the hospital with no questions asked. What are your thoughts on that type of system?

ALTERNATE

Opinion about coordinated taxi/auto-based EMS?

One of the goals of our project is to see if it would be possible to make a system to coordinate the transport of accident victims to hospital by taxi/autos using a smartphone app. Do you think taxi drivers should transport patients from crash scenes? Why or why not?

I am now going to describe the idea that we are considering. A group of taxi/auto drivers will be provided with smartphones containing the app and basic first aid training. When
an emergency call is received and no ambulance is available, the taxi/auto driver who is closest to the crash site will be contacted through the app and asked to provide transport. The app will provide navigation to the crash site and then onward to the closest hospital participating in the system. At the hospital, the driver will be paid for their effort using mobile-to-mobile cash transfer.

1. What do you think of such a system?
   a. What do you think are possible benefits of such a system?
   b. What concerns do you have about the system? (Probe: Do you worry that your contact information will be recorded by the system?)
   c. Another option is to have a simpler system in which all taxi/auto drivers are simply paid about Rs 500 for bringing an accident victim to hospital with no questions asked. What do you think about that system?

2. Would you be willing to participate in testing the smartphone app?
Interview Guide – Police Personnel

Taxi-based EMS

Taxi-based EMS for Developing Countries
Semi-structured interview guide: Police Personnel

Date:
Start Time:      End Time:
Location:
Interviewer:

___________________________________________________________

Title:
Years of service:

Questions

Responding to crashes

I want to start by asking you about how the police usually respond to road traffic crashes.

1. How do the police usually get to know about a road traffic crash? (Probe: Directly from the site, 100 number, police station)
   a. What happens next? How long does it take for the police to usually reach the scene?

2. How do you manage the crash scene?
   a. What are the main problems that you face at the crash scene? (Probe: injured persons, bystander management)

3. Do police personnel always arrive at the crash scene while the injured victim is still there?
   a. If yes, who decides who should transport the injured victim to the hospital? (Probe: Police, bystander, etc.)
      ● How is the decision taken regarding which vehicle to use to transport the victim? (Probe: PCR van, no PCR van?)
      ● Who decides what hospital to send the victim? (Probe: Does this change based on injury severity? Are there financial considerations? Victim’s preference?)
   b. If no, who typically at the scene takes the decision on how to transport the victim?
   c. If the victim is no more (already dead), how do you manage the transportation? Is there any difference compared with an injured person?

4. What do you think is the role of auto/taxi drivers in transporting injured persons to the hospital?

IG_PolicePersonnel_v2: 10 July 2017
Interview Guide – Police Personnel

a. Are auto/taxi drivers asked by someone at the scene to take the injured victim to the hospital or do they volunteer themselves?

b. (If they have been stopped by police/bystanders) How easy or difficult is it to stop a auto/taxi to transport the victim? How would this vary if the police were present compared to when it was only bystanders or accompanying people?

c. After being stopped at the crash site, how do you think auto/taxi drivers take a decision about whether to transport the victim or not? (Probe: concerns of auto/taxi drivers, presence of police, payment, presence of other auto/taxi drivers, etc.)

d. (If they have volunteered), why do you think auto/taxi drivers decide to transport the victim?

e. In the case of the auto/taxi drivers transporting victim, who decides what hospital to send the victim to? (Probe: injury severity? Are there financial considerations? Victim’s preference?)

Medico legal processes

Next, I would like to ask you about the medico-legal processes involved with road traffic crashes.

5. What medico-legal processes happen when the victim is brought to the hospital?
   a. Does this vary based on how victims are transported? (Probe: by ambulance, private vehicle, auto, taxi, police van)
   b. How do these processes vary depending on the type of injury? (Probe: major, minor)
   c. Are these procedures the same at other police stations in Delhi NCR? What about other parts of the country?

6. Do police record the contact information of auto/taxi drivers who drop off victims at the hospital?
   a. If so, what kind of information is recorded?
   b. Typically, how do auto/taxi drivers react to giving information? (Probe: are they willing?)

7. Are there ever any cases when the auto/taxi driver needs to be contacted after a crash? What are some reasons for this? How often are they usually contacted? (Probe: witness)
   a. Are auto/taxi drivers asked to visit the police station or court? If so, how often?

8. What are the legal protections that auto/taxi drivers might have in transporting the victim?

9. What about legal vulnerabilities?

Opinion about coordinated taxi-based EMS?

One of the goals of our project is to see if it is possible to build a system to network and coordinate autos/taxis to transport accident victims from the crash site to the hospital, navigated by a smartphone app. I want to ask your opinion about such a system. The system would work in the following way. A group of auto/taxi drivers, trained in basic first aid, will be provided with smartphones containing the app. When an emergency call is received at the control center and no ambulance is available, the auto/taxi driver who is closest to the crash site will be contacted through the app and asked to provide transport by the control center authorities (e.g., Police). The app will provide navigation to the crash site and then onward to the closest hospital participating in the system. At the hospital, the driver will be paid for their effort using mobile-to-mobile cash transfer.
10. What do you think of such a system?
   a. What do you think are the potential benefits of such a system? (Probe: time, cost?)
   b. What concerns do you have about the system? (Probe: Are you concerned that only traffic accident victims will be transported by the system and not victims of other emergencies? Coordination with ambulances and the police?)

11. Another option is to simply pay Rs 500 to any auto/taxi driver bringing in a victim to a hospital. There would be no network or app. Would such a system be better?

ALTERNATE

Opinion about coordinated taxi/auto-based EMS?
One of the goals of our project is to see if it would be possible to make a system to coordinate the transport of accident victims to hospital by taxi/autos using a smartphone app. Do you think taxi drivers should transport patients from crash scenes? Why or why not?

I am now going to describe the idea that we are considering. A group of taxi/auto drivers will be provided with smartphones containing the app and basic first aid training. When an emergency call is received and no ambulance is available, the taxi/auto driver who is closest to the crash site will be contacted through the app and asked to provide transport. The app will provide navigation to the crash site and then onward to the closest hospital participating in the system. At the hospital, the driver will be paid for their effort using mobile-to-mobile cash transfer.

1. What do you think of such a system?
   a. What do you think are possible benefits of such a system?
   b. What concerns do you have about the system? (Probe: Do you worry that your contact information will be recorded by the system?)
   c. Another option is to have a simpler system in which all taxi/auto drivers are simply paid about Rs 500 for bringing an accident victim to hospital with no questions asked. What do you think about that system?

2. Would you be willing to participate in testing the smartphone app?
Semi-structured interview guide: Other Stakeholders

Date:
Start Time:     End Time:
Location:
Duration:
Interviewer(s):
____________________________________________________________

Organization:

Years in the Organization:

Title:

Questions

1. Could you tell me briefly about how you become involved with road safety issues? How long have you been working on this topic?

Allow me to start by briefly describing the topic of our study. In India, road traffic accident victims are typically transported to hospitals by passing autos/taxis because of the high cost of ambulance-based emergency medical systems.

1. As we discussed earlier, the topic of our study is around the role of taxi drivers in transporting road traffic accident victims to the hospital. Thinking more generally, what is your assessment of how persons who are injured in road traffic accidents are currently transported to the hospital? (Probe: ways of transport, benefits and challenges of current system)

Our project aims to assess if it is feasible to build a system to coordinate the transport of accident victims to hospital by autos/taxis using a smartphone app. Briefly, such a system would work as follows. A group of auto/taxi drivers will be provided with smartphones containing the app and will undergo basic first aid training. When an emergency call is received and no ambulance is available, the auto/taxi driver who is closest to the crash site will be contacted through the app and asked to provide transport. The app will provide navigation to the crash site and then onward to the closest hospital participating in the system. At the hospital, the driver will be paid for their effort using mobile-to-mobile cash transfer.

I would like to hear your opinion about such a system.
1. What do you think would be the role of such a coordinated auto/taxi-based system in the current landscape of ambulance systems and pre-hospital care in India?

2. What do you think are possible benefits of such a system?

3. What concerns would you have about the system? (Probe: Are you concerned that only traffic accident victims will be transported by the system and not victims of other emergencies?)

4. What are the possible legal protections for such a system? (Probe: to auto drivers, to taxi drivers, to managers, etc.)

5. What are the possible legal vulnerabilities of this system? (Probe: to auto drivers, to taxi drivers, to managers, etc.)

6. Who do you think are the key stakeholders concerned with policy regarding pre-hospital transport of crash victims and how do you think they would respond to such a system?
   a. Government ministries (health, transport, others)
   b. Police
   c. Ambulance providers (Public, private)
   d. Civil society (NGOs, others)
   e. Hospitals (Public, private)

7. Another option is to have a simpler system in which all taxi drivers are simply paid about Rs 500 for bringing an accident victim to hospital with no questions asked. What are your thoughts on that system?