

Assessing the Risks

The steps in assessing the impacts on communities affected by the transportation of sugar cane on trucks include the following:

1. Identify potentials risks – What are the potentials risks associated to the transportation of sugar cane on trucks?
2. Identify communities affected by potential risks – Which communities are affected by the transportation of sugar cane on trucks?
3. Identify how potential risks may affect communities and probability of occurrence – How does the potential risks affect the communities and how likely is it occur?
4. Identify existing precautions and potential response to target potential risks – what methods exist as precautions to potentials risks and what can be done to eliminate or lessen probability of potential risk?
5. Identify how response may affect communities – how does the response affects the communities? Does the response enable a safer environment for all affected?

The outcomes of this process is documented through a Risk-Response Chart that captures the potential risks, responses, and impacts as shown below.

Risk Assessment Results

Risk/Threat Event	Vulnerabilities / Predisposing Characteristics	Mitigating Factors – Corrective Response	Likelihood (1-5)	Impact (1-5)	Risk Rating

Potential Risks

All plausible threats may call for action by private and/or public assistance, including risks arising from the following activities such as:

- Improper loading techniques and practices – Using inadequate straps and chains to brace cane inside trucks. Over packing cane inside trucks. Improper disposal of material.

- Road worthy trucks – Use of trucks that are not properly equipped (mirrors, reflectors, lights, mud flaps).
- Inadequate drivers – Drivers that are under the influence of alcohol or drugs. Drivers who are not licensed to operate trucks.
- Improper parking – Parking on the side of the road at nights without proper indicators. Parking trailers on the edge of roads and curves.

Lists of some potential risks. (Other risks may also apply.)

Low/Medium Risks

- Pollution
- Road traffic accidents due to poor or altered lighting of trucks.
- Road traffic accidents due to improper parking of sugar cane trucks.
- Road traffic accidents caused by intoxicated truck drivers.
- Accidents involving pedestrians due to poor driving skills.
- Accidents caused by over speeding.

High/Severe Risks

- Road inaccessibility due to cane falling on road.
- Road inaccessibility due to improper parking of trucks.
- Road traffic accidents due to faulty trucks dispelling particles
- Driving hazards due to cane on road or dangling cane stalks due to over packing

Step 2. Which communities may be affected by the potential risks?

Communities affected by potential risks include all communities that are on roads / highways that are accessed by sugar cane trucks. These communities include villages and towns. Those who are affected include residents, students, pedestrians and commuters.

Step 3. How can the potential risks affect the communities and what is the likelihood of its occurrence?

For each potential risk mentioned, the likelihood of its occurrence is assessed, taking into consideration both the current conditions and historical context. This is quantified using

A scale to determine whether the risk is high-medium-low.

Risk Value = Likelihood x Severity

Probability score (likelihood)	Impact score (severity)				
	1	2	3	4	5
1	1 (Low)	2 (Low)	3 (Low)	4 (Low)	5 (Med)
2	2 (Low)	4 (Low)	6 (Med)	8 (Med)	10 (High)
3	3 (Low)	6 (Med)	9 (High)	12 (High)	15 (High)
4	4 (Low)	8 (Med)	12 (High)	16 (High)	20 (Very high)
5	5 (Med)	10 (High)	15 (High)	20 (Very high)	25 (Very high)

Step 4. What methods exist as precautions to potentials risks? What can be done to eliminate or lesson probability of potential risk?

EXISTING CONTROLLED MEASURES	ADDITIONAL MEASURES
Truck inspection prior to issue of license	
Knowledge test prior to issue of driver's license	
Ministry of Works aid in cleaning roads	
Police check points on roads	
Established sugar cane tucks routes to factory	
Established communication between local law enforcement and Security Department	
Established communication between Security Department and Cane Farmer Relations	
Speed limits within communities	
Speed limits inside Factory Compound	

Additional methods of decreasing the probability of potential risks include the following:

Inspection – National Transport Department contacted to conduct general inspections of drivers and trucks and tractors.

Seminars – Cane Farmer Relations Department (CFRD) organize educational seminars that assist different cane farmer groups to learn all aspects of proper transport of sugar cane.

Law Enforcement Involvement – In addition to banning cane farmers under the influence of drugs and alcohol, the Security Department will inform authorities to intercept drunk drivers when they exit the Factory.

Security – Proper monitoring of sugar cane trucks entering the compound to ensure standard protocol are followed (i.e. wearing visibility vest and being properly clothed.)

Signs – Assist in creating signs to project information to all drivers. Put up signs of precaution and information to assist communities.

Step 5 - How does the response affect the communities? Does the response enable a safer environment for all affected?

- Ensuring that all trucks pass a detailed inspection will enable safer transport of Sugar Cane from Cane fields to the Factory. Appropriate trucks on the road will in turn create a safer environment for those in the communities who also use these routes.
- Educating farmers on the proper loading techniques will lessen pollution of material on roads. This will eliminate a potential driving hazard and will allow all roads to be freely accessible.
- Educating truck drivers on basic rules and regulations such as speed limits and highlighting difference in rules for regular motor vehicle and sugar cane trucks can assist in safer roads of transport and communities.

- Involving law enforcement would in turn lessen the extreme risk associated to drunk drivers such as accidents involving other vehicle and pedestrians. Drivers who arrive at the Factory drunk would be intercepted and a report made to the Police department, which would lesson risks of potential road traffic accidents.
- Signs on roads would assist the spread of information throughout communities and to drivers. This would help communities be aware of potential risks associated with the transport of Sugar Cane trucks.