GASOLINE

SAFETY DATA SHEET

IP&E Guam
IP&E Saipan
Revision Date: January 1, 2014

1. Product Identification

Product Name:	Gasoline
Synonyms:	Mogas, Motor Gasoline, Regular Unleaded Gasoline, Premium Unleaded Gasoline
Product Code:	Not Available
Product Type:	Fuel for spark ignition internal combustion engines designed to run on unleaded fuel.
Supplier:	IP&E Holdings, LLC. (dba: IP&E Guam)
Address:	643 Chalan San Antonio, Suite 100 Tamuning, Guam 96913-3644
Contact Number:	Guam: +1-671-647-0000 Saipan: +1-670-323-0647
Emergency Number:	Guam: +1-671-797-0464 (Field Operations Manager) Saipan: +1-670-287-4380 (Depot Manager)

2. Hazards Identification

Classification of the: substance or mixture

Flammable liquids: Category 1
Skin corrosion/irritation: Category 2
Germ Cell Mutagen: Category 1B
Carcinogen: Category 1B
Reproductive toxicant (developmental): Category 2
Target organ toxicant (central nervous system): Category 3
Aspiration toxicant: Category 1
Acute aquatic toxicant: Category 2
Chronic aquatic toxicant: Category 2

GHS Labels:

GHS precautionary statements:

Signal Word: Danger

Hazard Statements:

H224: Extremely flammable liquid and vapor
H304: May be fatal is swallowed and enters airways
H315: Causes skin irritation.
H332: Harmful if inhaled.
H336: May cause drowsiness or dizziness.
H340: May cause genetic defects.
H350: May cause cancer.
H361: Suspected of damaging the unborn child.
H411: Toxic to aquatic wildlife with long lasting effects.
H332: May cause damage to organs through prolonged or repeated exposure.
H319: Causes serious eye irritation.

Precautionary Statements:

General:

P101: If medical advice is needed, have product container or label at hand.
P102: Keep out of reach of children.
P103: Read label before use.

Prevention:

P210: Keep away from heat/sparks/open flames/hot surfaces. No smoking.
P233: Keep container tightly closed.
P273: Avoid release to the environment.
P240: Ground/Bond container and receiving equipment.
P241: Use explosion-proof electrical/ventilating/lighting/equipment.
P242: Use only non-sparking tools.
P243: Take precautionary measures against static discharge.
P260: Do not breathe dust/fume/gas/mist/vapors/spray
P264: Wash hands thoroughly after handling.
P271: Use only outdoors or in a well-ventilated.
P280: Wear protective gloves/eye protection/face protection.

Response:

P362: Take off contaminated clothing and wash before reuse.
P302+P352: If on skin, wash with plenty of soap and water.
P303+P361+P353: If on skin (or hair), remove/take off immediately all contaminated clothing, rinse skin with water/shower.
P332+P313: If skin irritation occurs, Get medical advice/attention.
P337+P313: If eye irritation occurs, Get medical advice/attention.
P305+P351+P338: If in eyes, rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
P301+P310: If swallowed, immediately call a poison center of doctor/physician.
P331: Do not include vomiting.
P304+P340: If inhaled, remove victim to fresh air and keep at rest position comfortable for breathing.
P321: If person is not breathing, provide artificial respiration. If there is labored respiration, certified person should manage oxygen.
P370+P378: In case of fire, use dry chemicals, CO2, water spray, firefighting foam for extinction.

Storage:

P403+P233+P235: Store in a well-ventilated place, Keep container tightly closed, Keep cool.
P405: Store locked up.

Disposal:

P501: Dispose of contents/container in accordance with regulations.

NFPA Classification: Health = 1; Fire = 3; Reactivity = 0

Human Health Hazards: Category 2 carcinogen, may cause cancer; may cause lung damage if swallowed; aspiration may cause chemical pneumonitis, which can be fatal; skin irritant; prolonged/repeated contact with skin may cause dafting and/or dermatitis; prolonged exposure to vapor concentrations may affect the central nervous system.

Safety Hazards: Extremely flammable; will float and can be reignited on surface water; ignition from vapors possible from large distances.

Environmental Hazards: Harmful to aquatic organisms; may cause long-term adverse effects in the environment; may penetrate soil and affect ground water; not readily biodegradable; has the potential to bio accumulate; persists under anaerobic conditions.

3. Composition/ Information on Ingredients

Name	CAS Number	Concentration %
Gasoline	8006-61-9	100%
Ethanol	64-17-5	Up to 10%
Toluene	108-88-33	Up to 10%
Benzene	71-43-2	Up to 2%
Cyclohexane	110-82-7	Up to 1%
Ethylbenzene	100-41-4	Up to 3%
Naphthalene	91-20-3	Up to 1%
N-Hexane	110-54-3	Up to 5%
1,2,4 - Trimethylbenzene	95-63-6	Up to 8%
Xylene	1330-20-7	Up to 10%
Cumene	98-82-8	Up to 0.5%

4. First-Aid Measures

Symptoms and Effects: Eye contact may cause transient irritation; ingestion may cause digestive tract irritation, diarrhea or vomiting; aspiration may cause chemical pneumonitis, which may be fatal; prolonged exposure to vapor concentrations may cause impairment of judgment, headache, dizziness, nausea, eye irritation, upper respiratory tract irritation; cardiac irregularities; convulsion, asphyxiation, unconsciousness or death.

First Aid – Inhalation: Move to fresh air. If breathing but unconscious, place in the recovery position. If breathing has stopped, apply artificial respiration. If no heartbeat, provide external cardiac compression. Monitor breathing and pulse. OBTAIN MEDICAL ATTENTION IMMEDIATELY.

First Aid – Skin Contact: Wash skin with water and soap.

First Aid – Eye Contact: Flush eye with water. If persistent irritation occurs, obtain medical attention.

First Aid – Ingestion:	Do not induce vomiting. Protect the airway if vomiting begins. Do not give anything by mouth. If breathing but unconscious, place in the recovery position. If breathing has stopped, apply artificial respiration. If no heartbeat, provide external cardiac compression. Monitor breathing and pulse. OBTAIN MEDICAL ATTENTION IMMEDIATELY.
Advice to Physicians:	Treat symptomatically. Diagnosis of ingestion is by the characteristic odor on the victim's breath and from the history of events. In cases of ingestion, consider gastric lavage. In cases of chemical pneumonitis, consider antibiotic and corticosteroid therapy. Administration of medicinal liquid paraffin may reduce absorption from the digestive tract.

5. Fire-Fighting Measures

Specific Hazards:	Hazardous combustion elements include may include carbon monoxide, oxides of nitrogen, unburnt hydrocarbons; will float and can be reignited on surface water; ignition from vapors possible from large distances.
Extinguishing Media:	Foam, water spray or fog. For small fires, dry chemical powder, carbon dioxide, sand or earth may be used.
Unsuitable Extinguishing Media:	Water and halon extinguishers should be avoided.
Protective Equipment:	Not Available
Other Information:	Keep adjacent drums and tanks cool by spraying with water.

6. Accidental Release Measures

Personal Precautions:	Vapor may travel along the ground for considerable distances. Remove all possible sources of ignition in the surrounding area and evacuate all personnel. Avoid contact with the skin, eyes and clothing. Immediately remove all contaminated clothing, nothing that the clothing may be a fire hazard.
Personal Protection:	Impervious overalls; nitrile rubber gloves; safety shoes; safety glasses.
Environmental Precautions:	Prevent from entering into drains, ditches or rivers. Use appropriate containment, such as absorbent booms, to avoid environmental contamination.
Clean-Up Methods:	Absorb or contain liquid with sand, earth or spill control material. Allow to evaporate or use a non-sparking shovel and place in a labelled sealable container for subsequent safe disposal. Do not disperse using water.
Other Information:	Observe all applicable local regulations. Notify local authorities as required.

7. Handling and Storage

Handling:	Do not eat, drink or smoke while handling. Use only in well-ventilated areas. Take precautionary measures against static discharges. Earth or bond all equipment.
Storage:	Locate tanks away from heat and other sources of ignition. Drums should be staked no more than 3 high. This product must never be stored in buildings occupied by people. Small volumes may be stored in a suitably designed portable container. Such containers should be stored in well-ventilated areas or flameproof cabinets. Do not store in unsuitable, unlabeled or incorrectly labeled containers. Keep container tightly closed in a dry, well-ventilated place away from direct sunlight and other sources of heat or ignition. Keep in a bunded area. Prevent ingress of water. Keep out of reach of children.
Product Transfer:	Electrostatic charges may be generated during pumping. Ensure electrical continuity by bonding all equipment. Avoid splash filling. Wait 10 minutes after tank filling before opening hatches or manholes.
Recommended Materials:	For containers, use mild steel where it does not present an unnecessary fire hazard. For container linings, use amine-adduct cured epoxy paint. For seals and gaskets, use compressed asbestos fibre, PTFE, Viton A, Viton B.

8. Exposure Controls/ Personal Protection

Engineering Control Measures:	Provide exhaust ventilation or other engineering controls to keep airborne concentrations of vapors below their respective occupational exposure limits. Ensure that eyewash stations and safety showers are close to the workstation location.
Respiratory Protection:	Not normally required. In a confined space, self-contained breathing apparatus may be required.
Hand Protection:	PVC or nitrile rubber gloves.
Eye Protection:	Monogoggles.
Body Protection:	Wear overalls to minimize contamination of personal clothing. Launder overalls and undergarments regularly. Wear safety shoes.
Occupational Exposure Standards:	Not Available

9. Physical and Chemical Properties

Property	Unit	91R (RUL)		95R (PUL)	
		Min	Max	Min	Max
Appearance		Clear & Bright		Clear & Bright	
Color		Orange		Undyed	
API Gravity @ 15.6°C	API		Report		Report
Density @ 15°C	Kg/L		Report		Report
SG @ 15.6°C			Report		Report
Distillation - IBP	°C		Report		Report
Distillation - 10% Evaporation	°C		70		74
Distillation - 50% Evaporation	°C	75	120	75	120
Distillation - 90% Evaporation	°C		185		185
Distillation - FBP	°C		225		225
Distillation - Residue	%Vol		2		2
Distillation - Loss	%Vol		Report		Report
RVP @ 37.8°C	PSI or kPa		11 or 75		11 or 75
Sulfur	wt ppm		1000		1000
Existent Gum	mg/ 100ml		5		5
Mercaptan Sulfur	ppm		15		15
Induction Period @ 100°C	min	240		240	
Research Octane No. (RON)		91		95	
Motor Octane No. (MON)			Report		Report
Anti-Knock Index		87		91	
Copper Corrosion @3hrs @50°C			1		1
Lead Content	gmPb/Usg		0.05		0.05
MTBE	%Vol		0.5		0.5
Phosphorus	g/L		0.005		Report
Fe			Nil Addition		Nil Addition
Mn			Nil Addition		Nil Addition
Benzene	%Vol		Report		Report
Ethylbenzene	%Vol		Report		Report
Toluene	%Vol		Report		Report
Total Aromatics	%Vol		Report		Report
Xylene	%Vol		Report		Report
Additive - Dye - Type			Report		Report
Additive - Dye - Concentration	Vol ppm		Report		Report
Silver Strip Corrosion			1		1

10. Stability and Reactivity

Stability and Reactivity: Stable under normal ambient temperature. The liquid and vapor are extremely flammable with the vapor able to cause flash fire.

Incompatibility: Product is reactive with strong oxidizers.

Hazardous Polymerization: Not expected to occur.

Conditions to Avoid: Heat, sparks, open flames and buildup of static electricity. Avoid high temperatures and all sources of ignition. Keep away from strong oxidizing agents.

11. Toxicological Information

Carcinogenicity: Benzene has been identified by the EPA and IARC as a human carcinogen. Gasoline mixtures are listed as a possible carcinogen by IARC and NIOSH.

Target Organs: Potential gasoline components that have demonstrated developmental and or target organ issues include n-hexane, toluene, benzene, ethyl benzene, trimethylbenzene, cyclohexane and naphthalene.

12. Ecological Information

Ecological Information: This product is potentially toxic to aquatic organisms and should be kept out of sewage and drainage systems and all bodies of water. On release to the environment, the lighter product components will readily evaporate, but the remainder may become dispersed in the water or absorb to soil. Primary components of this product are considered biodegradable in aerobic conditions.

13. Disposal Considerations

Precautions: See Section 8

Waste Disposal: Disposal of this product, solutions and any by-products should comply with all applicable federal, state and local environmental regulations.

14. Transport Information

Regulatory Information	UN Number	Emergency Response Guidebook	Proper Shipping Name	Class	Packing Group
DOT Classification	UN1203	Guide 128	Gasoline, UN1203	3	II
International Maritime Dangerous Goods (IMDG)	UN1203	Guide 128	Gasoline, UN1203	3	II
International Civil Aviation Org / International Air Transport Assoc (ICAO, IATA)	UN1203	Guide 128	Gasoline, UN1203	3	II

15. Regulatory Information

This product contains the following chemicals subject to the reporting requirements of SARA 302, SARA 304, SARA 313, CERCLA and 40 CFR 372.

Chemical Name	CAS Number	Material Concentration	CERCLA / SARA Section 302 TPQ (lbs)	CERCLA / SARA Section 304 TPQ (lbs)
Cumene	98-82-8	<0.5		5000
Benzene	71-43-2	<2.0		10
Cyclohexane	110-82-7	<1		1000
Ethylbenzene	100-41-4	<2		1000
Trimethylbenzene	95-63-6	<8		
Naphthalene	91-20-3	<1		100
N-Hexane	110-54-3	<5		5000
Toluene	108-88-3	<10		1000
Xylenes	1330-20-7	<10		100

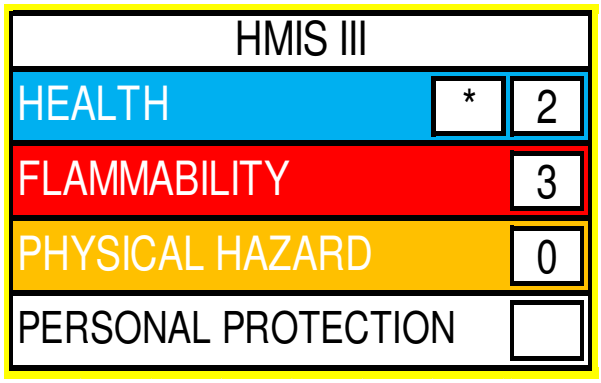
EPA SARA 311 / 312 Title III Hazard Categories:

Acute Health Hazard	Yes
Chronic Health Hazard	Yes
Fire Hazard	Yes
Pressure Hazard	No
Reactive Hazard	No

This product may contain chemicals that have been identified as a carcinogen by NTP, IARC or OSHA.

16. Other Information

Hazardous Material Information System (USA):



National Fire Protection Association (USA):