PROPOSED PORTLAND PROPANE EXPORT TERMINAL INFORMATION PACKAGE
ABOUT PEMBINA

PEMBINA IS A LEADING ENERGY TRANSPORTATION AND MIDSTREAM SERVICE PROVIDER, SERVING NORTH AMERICA FOR OVER 60 YEARS. Our strategically located and integrated energy infrastructure enables us to offer essential services for the energy industry across the hydrocarbon value chain. As a trusted member of the communities in which we operate, we are committed to safe, responsible and reliable operations and to generating value for our investors.

- 1954 – company was founded
- 1997 – became a publically traded company
- 2010 – converted from an income trust to a corporation
- 2012 – acquired Provident Energy and became listed on the NYSE under PBA
- 2014 – listed as one of Alberta’s Top 65 Employers
- 1000+ employees
- $15 billion – enterprise value (approx.)
- Head office in Calgary, Alberta, Canada

PROPOSED PORTLAND PROPANE EXPORT TERMINAL PROJECT

PROJECT OVERVIEW

Pembina Marine Terminals Inc. (“Pembina”), a subsidiary of Pembina Pipeline Corporation, recently entered into an agreement with the Port of Portland. Pembina is proposing to construct and operate a marine terminal for the export of propane; the proposed Pembina Portland Propane Export Terminal Project (the “Project”). The expected capital investment is approximately $500 million (USD). The Project would utilize the Port of Portland’s existing Berth 607 and adjacent industrial land in the Port’s Marine Terminal 6, located in the Rivergate Industrial District in North Portland. The Project would not be located within a residential area.

The facility would receive shipments, averaging 37,500 barrels or approximately 1.6 million gallons per day, of propane via rail from Pembina’s Redwater Facility northeast of Edmonton, Alberta. The propane would be unloaded, chilled and stored for 15 days in above-ground refrigerated holding tanks, before being loaded to a propane ship for export to global markets. Pembina estimates there to be two-to-three vessel shipments per month.

The Project is being designed for a minimum of 25 years of service, with the expectation that it will run beyond that time period. The proposed in-service date, subject to regulatory and environmental permit approvals, is scheduled for Q1 2018.

Propane would be the only commodity to be shipped from this site. The site will not accommodate handling and shipment of crude oil or liquefied natural gas.
PROJECT DETAILS
When completed, a rail-served, marine terminal and propane export facility would include:

- a rail yard with propane unloading equipment;
- rail unloading tanks with a total storage capacity of approximately one million gallons to receive delivered propane;
- refrigeration equipment;
- two large, refrigerated double-walled, propane storage tanks capable of holding up to 800,000 barrels (approximately 33.6 million gallons);
- a flare stack and above-ground facility piping connecting the equipment; and
- a control center, office, shop and maintenance facilities.

The marine terminal will consist of a wharf, modified to accommodate ocean-going ships capable of transporting propane, with a materials ship-loading area and associated trestle and above-ground piping to transport the product from the storage tanks to the ship.

These facilities will be supported by infrastructure and equipment including: power supply and distribution; water supply and distribution (including fire water); utilities; waste collection and treatment and a supporting maintenance area.

The propane will be in liquid form throughout the course of its handling. By cooling or compressing propane, it changes from a gas to a liquid state. The product will be either under pressure, or refrigerated, during its transportation, storage and export. There is no further compression of the propane from the rail car to the refrigerated storage tanks; therefore it will occupy the same volume in the tank as it did in the rail car.
PROJECT SCHEDULE

<table>
<thead>
<tr>
<th>Proposed* Schedule – Portland Propane Export Terminal Project</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Consultation</strong></td>
</tr>
<tr>
<td><strong>Engineering and Design</strong></td>
</tr>
<tr>
<td><strong>Environmental and Regulatory Processes</strong></td>
</tr>
<tr>
<td><strong>Procurement</strong></td>
</tr>
<tr>
<td><strong>Construction</strong></td>
</tr>
<tr>
<td><strong>Facility Start-Up</strong></td>
</tr>
</tbody>
</table>

*Date ranges are based on a best-case scenario and are subject to change

*Please see forward-looking statements information at the end of this booklet

PROJECT RATIONALE

North America’s energy markets have experienced a shift in recent years with North American propane supply exceeding near and long-term forecast demands. Current forecasts indicate excess domestic supply through to at least 2040.

There is worldwide demand for propane as a cooking, heating, auto fuel and plastics manufacturing agent. Increased propane production from the natural resources in Canada’s Western Canadian Sedimentary Basin (“WCSB”) and new shale gas developments in the United States (“U.S.”), such as the Eagle Ford, Barnett, Haynesville and Marcellus plays, has significantly increased the availability of propane within the U.S.

Market demand for propane from around the world, especially the Asia-Pacific region, presents one of the closest and most attractive long-term markets available for excess propane from Canada’s WCSB while at the same time addressing environmental sustainability questions for that region.

Pembina has scouted a number of possible locations for a west coast marine export facility north and south of the U.S./Canada border for over two years. Portland was chosen for its readily available land, which is already zoned for heavy industrial use; existing marine berth; dual rail connectivity; Portland’s skilled labor force and its geographic proximity to international markets.

Pembina (and Provident whom we acquired in 2012) has been transporting propane in Western Canada, as well as Oregon and Washington State, for over 15 years. Pembina will continue to provide domestic propane service to Oregon.

For the year-to-date, Pembina has shipped 7.5 million gallons of propane to Oregon; 3.1 million of them were delivered to the City of Portland. Considering our existing presence in Portland, and Oregon more broadly, this location makes for a strong business case.
PROJECT BENEFITS

Construction and operation of the proposed Project will result in significant benefits to the surrounding communities including:

**Job Creation:** 600-800 good-paying construction jobs, at the peak of construction, will be required. Pembina will examine all options in its hiring plans. Meetings with labor organizations are on-going and, where appropriate, Project Labor Agreements (PLAs) will be concluded.

To operate the facility, Pembina will hire a number of full-time, permanent positions which include:

- Facility Operators
- Rail / Rail Car Unload Staff
- Instrument Technicians
- Mechanics
- Millwrights
- Administration

The estimated value of these direct Pembina jobs is $7.2 million annually. Annual base salaries will vary based on position and experience, but are estimated to average $70,000 to $120,000. When hiring qualified personnel for the facility, Pembina will hire from the local labor pool in Portland and area.

**Procurement Opportunities:** Local businesses will have the opportunity to provide services in a range of areas related to the construction of the Project. Once in operation, the facility is expected to incur an annual $25-$30 million in operating expenses.

**Economic Benefits:** The Project will generate significant economic development opportunities in the region. Once in operation, the facility is estimated to generate approximately $12 million in annual property tax revenue including an estimated $3.3 million to the City of Portland, $2.4 million to Multnomah County and $3.1 million to Portland Public Schools annually.

Pembina has stated, as one of our corporate goals, to be a ‘neighbor of choice.’ Portland’s practice of entering into Community Benefit Agreements (CBAs) is well-known to us and we will engage with the community on this opportunity when it is appropriate to do so.

**Project is funded 100% by Pembina:** The investment in this Project, the Port and the community of Portland will be funded solely by Pembina and no taxpayer, or city subsidies, will be requested.
ABOUT PROPANE

Propane is derived from the natural gas used to heat your home. When natural gas is produced, it typically contains a variety of associated hydrocarbons, water and other associated impurities. Natural gas processing plants separate all of the various hydrocarbons and fluids from the pure natural gas to produce what is known as “pipeline quality” dry natural gas. Among the natural gas liquids that are separated in this process is propane.

Propane can be separated from the natural gas liquids by raising the temperature and separating the lighter ends (i.e. propane) from the heavier components. It is similar to boiling water and collecting the rising steam. This separation process will be completed at Pembina’s Redwater Facility in Canada, northeast of Edmonton, Alberta, before shipping the propane to the proposed facility in Portland.

Pembina receives its natural gas liquids from the Western Canadian Sedimentary Basin (“WSCB”) in Alberta, not the oil sands deposits. The propane Pembina will ship is a product of natural gas processing, not crude oil refining.

The process of refrigerating, or pressurizing propane, turns propane from a gas into a liquid, makes it smaller in volume by 270 times and allows for easier transportation and handling. At our proposed terminal, the propane will be received as a liquid, similar to how one receives propane in a barbecue tank (about ten times atmospheric pressure and 60-80 degrees Fahrenheit). The propane temperature would then be lowered to -44 degrees Fahrenheit and just a few pounds above atmospheric pressure. At these conditions, the propane would look similar to water in a cup.

COMPONENTS OF RAW NATURAL GAS

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PROPANE SAFETY
Propane is a safe product that most people are already familiar with in their day to day lives. Propane-based barbeques are common throughout North America and, in general, people are comfortable handling their own refuelling needs. This comfort exists because propane equipment and appliances are manufactured to rigorous safety standards. Propane is a stable fuel that can be safely stored in sturdy tanks for a long period of time.

Propane has a narrow range of flammability when compared with other petroleum products. It won’t ignite when combined with air unless the source of ignition reaches at least 940 degrees Fahrenheit. In contrast, gasoline will ignite when the source of ignition reaches only 430 to 500 degrees Fahrenheit. Further, if liquid propane leaks, it doesn’t puddle, but instead vaporizes and dissipates quickly into the air. Being heavier than air, propane vapor can gather low to the ground if the volume released is significant. Pembina’s proposed facility will include safety measures such as gas monitoring equipment and on-site detection systems.

ENVIRONMENTAL CONSIDERATIONS
Propane is clean burning and effectively competes with other fossil and renewable fuels on efficiency and greenhouse gas emissions in many applications. Its simple chemical make-up allows it to burn cleaner than coal, light and heavy petroleum fuels, ethanol, and even natural gas in some cases.

Propane gas is not harmful to soil and water, and is an approved, clean fuel listed in the 1990 U.S. Clean Air Act. The Clean Air Act also notes that it meets the standards for reducing acid rain and controlling air pollution in urban areas. Propane is not a greenhouse gas, and under federal and state air quality regulations is not considered a criteria air pollutant or a hazardous air pollutant.

According to the Environmental Protection Agency (EPA), much of the sulfur dioxide in the atmosphere, which produces acid rain, is attributable to coal-fired electricity-generating facilities. In contrast, neither the process by which propane is produced nor the combustion of propane gas produces significant acid rain contaminants.
No job is too important that it can’t be done safely and anyone on a Pembina worksite is empowered to speak up, or ‘stop a job,’ if they feel conditions are unsafe.
FACILITY LAYOUT

PROPOSED LOCATION

The Project would be located on land adjacent to the east end of the Port of Portland’s Marine Terminal 6 in North Portland, on land that is already zoned for heavy industrial use in the Rivergate Industrial District.

This facility layout illustration is conceptual and is intended for consultation purposes. If the design should change as a result of Project development, stakeholders will be advised accordingly.
SAFETY

Pembina’s safety culture – ‘Safety Starts with Me – Zero By Choice’ – is fundamental to our operations. No job is too important that it can’t be done safely and anyone on a Pembina worksite is empowered to speak up, or ‘stop a job,’ if they feel conditions are unsafe.

Our Safety, Environment & Security (“SES”) management system is the cornerstone of Pembina’s success and is deeply embedded in our corporate culture. We reinforce our commitment to excellence in SES in our daily operations through the development of stringent standards, regular safety meetings, extensive contractor screening, rigorous project inspection, review of potential hazards, and ensuring our operations meet or exceed industry best practices.

We are working towards zero; Pembina believes all injuries and incidents are preventable. That’s why we won’t stop until we reach our goal of zero workplace incidents. To achieve this, we have a combination of programs and procedures (which include our emergency response plans, discussed later) and an incident reporting, tracking and investigation system.

“Did you Know?”

Pembina has not had a single employee lost work day, as the result of an incident, for 2014.

Tracking safety statistics is just as important as measuring operating and financial performance. It’s a key part of our operations and allows us to see how we’re doing and where we need to improve. Specifically, it gives us a benchmark to measure against in future years, it helps us analyze our current results, and it gives us the information we need to identify potential opportunities for improvement. On a regular basis, our field representatives, safety personnel and management teams review all incidents that do happen, allowing us to understand the root cause and implement corrective and/or preventative measures. We continue to work towards leading types of safety metrics to be more proactive in incident prevention.

FACILITY SAFETY

The site will be attended 24 hours a day, 365 days a year, with on-site personnel and automated controls to detect and prevent any issues. The site will be monitored by gas and fire detection and include emergency shut-down valves and equipment. Regular maintenance and inspection programs will be undertaken to ensure the integrity of the equipment and piping on-site.

The refrigerated storage tanks will be steel, double-walled tanks (i.e. a tank within a tank) with monitoring of the space between the tanks walls. A leak from the inner tank would be detected and contained in the outer tank. The facility will have emergency shutdown valves isolating individual parts of the terminal, as well as pressure relief and flare valves to route the propane to a flare stack, for a safe, controlled combustion and release, in the unlikely event of a failure. In the event of a power outage and the refrigeration compression was without power; the propane would slowly heat up, converting to a gas (similar to water boiling off as steam) and similarly, be routed to the emergency flare stack for a safe, controlled combustion and release.

Pembina will have its own emergency power (battery, plus diesel-driven generation) to supply power to control systems, monitoring, lighting, emergency shutdowns, the flare stack and other key devices. The facility would be shut-in under a controlled situation utilizing this emergency power. All propane contained in rail cars, the unloading storage, refrigeration system and associated piping would remain within those systems as the design will be able to contain these volumes.
SEISMIC CONSIDERATIONS
An extensive geotechnical and seismic hazard investigation is currently being completed at the site. This investigation includes over 40 explorations with some to over 150 feet in depth. The seismic hazards being evaluated as part of the study include ground shaking, soil liquefaction, lateral spreading and seiches.

These investigations will provide mitigation recommendations to address the seismic hazards in the area and suitably support the proposed structures at the design-level earthquakes, a magnitude-7 Portland Hills Fault Zone earthquake and a magnitude-9 earthquake near the Oregon Coast, as required by the 2012 International Building Code (“IBC”) and 2014 Oregon Structural Specialty (“Seismic”) Code.

Post these design-level earthquakes, the design for the facility must ensure the structures will support gravity load, damage that does occur doesn’t prevent egress for occupants and the tanks will retain containment capability.

EMERGENCY PROCEDURES
The facility will meet all required regulatory standards to prevent any release of product. In preparation for an emergency situation, the design for the facility will include safety measures such as:

• monitoring equipment for pressure and temperature control;
• shut down procedures to prevent pressures from exceeding the facility design;
• emergency fire and gas detection equipment; and
• pressure relief devices and emergency valves to route the propane to a flare stack where it can be safely controlled.

The facility will be manned by skilled operators 24 hours a day, 365 days a year, to oversee the safe operation of the facility and ensure proper safety and security protocols are enforced. In the unlikely event of a fire, a chemical suppressant would be ineffective in controlling a propane-based incident. Pembina and Portland Emergency First Responders would use water to cool and control such an incident.

In the unlikely event that liquid propane is released from a rail car, it would vaporize and dissipate into the air; it would not pool. Rail cars are equipped with an emergency pressure release valve in order to relieve pressure in the event of an incident which reduces the combustible nature of the gas while transported in rail cars.

RAIL SAFETY
Pembina’s Redwater rail yard is the largest in Western Canada, outside of the national rail carriers, with over eight miles of track capable of holding 620 cars and a loading capacity of 70,000 barrels, or approximately 2.9 million gallons (U.S.), of products daily.

Our practice of safely handling our rail cars, during loading and unloading procedures at our Redwater Facility, has earned Pembina repeated Safe Handling awards from the main rail carriers in Canada and the United States. These achievements include:

• Burlington Northern Santa Fe (BNSF) Safe Handling Award – 14 years
• Canadian National (CN) Safe Handling Award – 9 years
• CSX Chemical Safety Award – 13 years
• Canadian Pacific (CP) – 2014 Shipper Safety Award

These awards are presented only to companies shipping a minimum of 600 carloads of chemicals and hazardous products per year, without a non-accident release.

Pembina is planning to ship the propane via unit trains (trains of a single commodity), with a train arriving at our proposed facility every two days. There is no further compression of the propane from the pressurized rail car to the refrigerated storage tanks. In other words, the propane in the rail cars will occupy the same volume as in the refrigerated tanks.
In choosing a rail carrier for this proposed Project, Pembina is working to understand the rail companies’ safety procedures and emergency response protocols, as well as the routes our product would travel. This is very important to understand, as Pembina will want to work with a company that is devoted to safe and reliable operations. To date, Pembina has not confirmed a rail transportation provider, or route, for this Project. Pembina anticipates an answer to this question by mid-to-late 2015.

OUR RAIL FLEET
Pembina’s rail fleet is comprised of over 1,200 pressurized, DOT 112 rail tank cars. These cars are specifically designed to carry a product such as propane and have safety features that make them compliant with all transportation and safety standards in Canada and the U.S.

PEMBINA’S RAIL FLEET QUICK FACTS

- Fleet of over 1,200 DOT 112 pressure rail cars
- Average age of cars is six years
- Pembina’s tank car fleet is 100% leased – covering both manufacturer repair and maintenance services
- Complies with all current regulatory standards

DOT 112 pressure rail cars include the following safety features:
- 11-gauge jacketed shell
- 0.618-inch thick, normalized steel shell
- 0.5-inch thick, full head shields and equipped with top-fitting protection
- 0.5-inch ceramic fiber insulation (thermal protection)

Safety Features of a DOT 112 Pressurized Rail Car

11-gauge jacketed shell / 0.618”-thick normalized steel

RAIL BUSINESS AND FLEET DETAILS

- As of November 1, Pembina has shipped nearly 29,000 railcars in 2014.
- Pembina shipped approximately 25,000 railcars per year in 2012 and 2013.
- Pembina will take delivery of over 800 new DOT 112 pressure cars for its leased fleet through mid-2016 to meet the needs of the proposed Project.
- Fleet is continuously being upgraded.
- Primary focus is on operating a safe, efficient and effective fleet.
Pembina expects to use ships called Very Large Gas Carriers (“VLGC”) for this Project as they are specifically designed to carry products such as refrigerated liquid propane. The ships may be up to 750 feet in length and carry up to 23 million U.S. gallons of propane with drafts of less than 39 feet, allowing them to navigate the channel which is 43 feet deep.

The VLGC used to carry propane are double-hulled and constructed of low-temperature steel, specially designed to handle the cold liquids being transported and each have their own refrigeration systems to maintain the temperature of the product.

Pembina has been consulting with the U.S. Coast Guard, as well as the Columbia River Pilots, on this Project to better understand the Project’s implications to marine traffic and safety. The U.S. Coast Guard will conduct a Waterway Suitability Assessment (WSA) for the Project that will assess safety and security considerations for the Port, the facility and the proposed ship routes in U.S. waters. The Coast Guard will receive and review the project information and possibly establish what it refers to as a “Safety and Security Zone,” for the facility.

Specifically, the Coast Guard may impose a security zone of 500 yards in all directions from the vessel, but this zone is applied at the discretion of the Coast Guard. Entry into a security zone is allowed only with permission and at the discretion of the Coast Guard. In the event a security zone is established under these regulations, the Coast Guard will issue a local broadcast notice to mariners.

The Coast Guard has established specific regulations for other similar facilities in other waterways. Common requirements in these regulations include the provision of advance notice of upcoming safety zone by the Coast Guard to the marine community and most allow for access through the zone if permission is requested and granted by the relevant captain of a port, or designate.
ENVIRONMENTAL MANAGEMENT

OVERVIEW
Pembina employs an Environmental Management System to minimize and manage the impact our growth projects and operations have on the natural environment.

Pembina conducts environmental studies and assessments to determine the potential effects operations may have on the soil, land, air, plants, wildlife and watershed. Detailed plans are developed in consultation with local regulatory authorities, Tribal (First Nation) communities, landowners and other stakeholders in order to minimize our environmental footprint. For example, we have installed groundwater monitoring wells at many of our operating facilities. We use the annual or bi-annual monitoring results from these sites to map trends, gain early indications of potential soil/groundwater impact and identify appropriate or necessary remedial actions.

Measuring the effectiveness of our Environmental Management System by conducting regular environmental audits is the key to continuous improvement. Every year at least one of Pembina’s operating areas is subject to a third-party environmental audit. Findings are integrated into our overall Environmental Management System working towards achieving our company wide goal of zero incidents.

Pembina deploys environmental inspectors and specialists in the field during construction to assure environmental compliance and assist in mitigating environmental concerns that may arise.

GREENHOUSE GAS EMISSIONS
Propane, with its tiny carbon footprint and high efficiency, can play a major role in fighting climate change by reducing greenhouse gas emissions when it is used to replace more carbon intensive fuels. Burning most fuels used in the world today, from coal to wood, oil, gasoline and natural gas, produces various kinds of carbon that contribute to global warming as greenhouse gases (GHG’s). Propane has a lower carbon content than gasoline, diesel, kerosene and ethanol:

End-Use CO₂ Emissions by Fuel
(Kg CO₂ Equivalent/Million Btu)

Source: The Canadian Propane Association (www.propane.ca)

Although natural gas (consisting primarily of methane) generates fewer CO₂ emissions per British Thermal Unit (BTU) than propane when burned, methane is a direct greenhouse gas when released into the air. Propane, on the other hand, is not a greenhouse gas when released. The difference is in how quickly propane, compared to natural gas, can be removed from the air by natural oxidation or precipitation – propane is removed from the atmosphere faster than it takes for it to have an impact on the climate.
FACILITY EMISSIONS
The facility is designed as a closed loop system which means that under normal conditions all propane is retained within the equipment, piping and tanks; the propane is not vented to atmosphere or burned at the site. The facility equipment is powered by electricity. Consequently, the proposed terminal will have limited air emissions during normal operation and these would mainly be from heating of the small office and shop space. The on-site flare will only be used during upset events, or for maintenance.

REGULATORY PERMIT PROCESS
The proposed Project requires permit approvals and reviews from local, state and federal agencies including the City, the Oregon Department of State Lands, the Oregon Department of Environmental Quality, the U.S. Army Corps of Engineers, the Federal Aviation Authority and the U.S. Coast Guard State. Along the way, these processes will include opportunities for public comment.

Based upon current design concepts, Pembina anticipates NEPA will be triggered due to the federal permit(s) required by the U.S. Army Corps of Engineers for the in-water components of the Project. We expect the scope of in-water components requiring approval to be limited in nature and potential effects.

EMERGENCY RESPONSE
Pembina regularly trains for a variety of emergency situations ensuring our staff are prepared to respond safely and effectively. We also engage local First Responders in exercises to educate them on the products we handle and our respective roles to enhance our preparedness.

Corporate and Site Specific Emergency Response Plans (“ERP”s) are maintained for all Pembina’s facilities and products. These plans set out specific procedures and responsibilities to ensure an incident is responded to safely and effectively. For every regulated ERP Pembina has in place, we are required annually to test the plan by conducting an exercise appropriate to the facility and area operations.

We require our employees to have the skills they need to respond safely and effectively to an incident. We do this through conducting tabletop scenarios and full-scale exercises. This training helps us minimize potential impacts to the communities in which we operate, to the environment, and to our customers.

Pembina’s Emergency Management Program is comprised of hazard and environmental assessments, development of integrity programs and safe operating procedures. These same processes will be used to develop a site-specific ERP for the Project site. Preparedness is addressed through continuous planning and on-going communication and involvement with the public, local governmental agencies and First Responders. If it was determined that local First Responders lacked equipment critical to handling a potential incident on our site, Pembina would support the purchase of such equipment.

Pembina is currently conducting modeling studies for the facility to prepare its site-specific Emergency Response Plan. An ERP is typically developed alongside the construction of a facility, not before.

“Did you Know?”
Complete combustion of propane produces clean water vapor and carbon dioxide.
INCIDENT HISTORY

On July 31, 2000 Pembina purchased a pipeline system and late on that same day the transfer of ownership was finalized; a crude oil leak occurred about 56 miles upstream from the Town of Chetwynd, British Columbia (B.C.) on the Pine River. Approximately 250,000 gallons of light crude oil spilled from the pipe, with about half entering the Pine River.

Pembina assumed full responsibility for the incident; immediately implementing the Emergency Response Plan. Full clean-up efforts lasted five months involving many local contractors and Aboriginal First Nations (Tribal Communities). Fourteen months after the incident in the fall of 2001, Pembina successfully received regulatory releases for the river cleanup.

In April 2004, Pembina received a letter from the B.C. Ministry of Environment advising that Pembina had completed all the ordered actions with regard to the incident.

RECENT INCIDENTS

In three separate pipeline incidents this year, the volume of the product (crude oil) released in each incident, was less than two cubic meters (m³), or approximately 528 gallons. The Alberta Energy Regulator requires reporting of all product releases outside a company’s operating lease, or property, regardless of volume.

The first incident occurred on a customer’s valve site as a result of a faulty pump seal and the product moved off the property as a result of the customer’s less-than-adequate containment dyke. As this incident occurred during the winter, the product that migrated off-property was not discovered until the snow melted in the spring. The remaining product was successfully cleaned-up. In the second incident, the product remained on lease and although was less than the reporting threshold, Pembina still chose to report the incident. The release was attributed to a faulty ‘o-ring’ seal, which has been replaced. The third incident was the result of a pipeline failure due to over-pressurization of the line during a routine maintenance procedure. Although less than one cubic meter, or approximately 264 gallons was released, the product was not contained to Pembina’s property and was therefore reported to the regulator.

Regardless of size or location, incidents are reported, investigated, and analyzed to prevent recurrence, and to improve Pembina’s performance. Effective incident investigation, reporting, and follow-up focuses on root causes and/or system failures. Corrective and preventative actions are then used to reduce the potential for future similar events.

FORWARD-LOOKING STATEMENTS & INFORMATION

This presentation is for information purposes only and is not intended to, and should not be construed to constitute, an offer to sell or the solicitation of an offer to buy, securities of Pembina Pipeline Corporation. This presentation and its contents should not be construed, under any circumstances, as investment, tax or legal advice. Any person accepting delivery of this presentation acknowledges the need to conduct their own thorough investigation into Pembina and its activities before considering any investment in its securities.

This document includes forward-looking statements or information within the meaning of the “safe harbor” provisions of applicable securities legislation which are based on Pembina’s expectations and assumptions in light of its experience and its perception of historical trends, current market conditions and perceived business opportunities. Such forward-looking information and statements relate to business strategy and plans, anticipated expenditures, benefits, timing of the terminal project and other expectations, beliefs, goals, objectives, assumptions or statements about future events or performances. Undue reliance should not be placed on these forward-looking statements and information as both known and unknown risks and uncertainties may cause actual performance and financial results to differ materially from the results expressed or implied.

Information on risk factors that could impact Pembina’s operational and financial results are contained in Pembina’s Annual Information Form and Management’s Discussion and Analysis, and described in our public filings available in Canada at www.sedar.com and in the United States at www.sec.gov. The forward looking statements contained in this document speak only as of the date of this document. Except as expressly required by applicable securities laws, Pembina and its subsidiaries assume no obligation to update forward-looking statements and information should circumstances or management’s expectations, estimates, projections or assumptions change. The forward-looking statements contained in this document are expressly qualified by this cautionary statement.
<table>
<thead>
<tr>
<th>Term</th>
<th>Description</th>
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<tbody>
<tr>
<td>CBA</td>
<td>Community Benefit Agreement</td>
</tr>
<tr>
<td>DOT 112</td>
<td>Model number of rail tank cars in Pembina’s fleet</td>
</tr>
<tr>
<td>ERP</td>
<td>Emergency Response Plan</td>
</tr>
<tr>
<td>NEPA</td>
<td>National Environmental Policy Act (U.S. Federal)</td>
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<tr>
<td>NGL</td>
<td>Natural Gas Liquids – typically: methane, ethane, propane, butane and condensates</td>
</tr>
<tr>
<td>PLA</td>
<td>Project Labor Agreement</td>
</tr>
<tr>
<td>SES</td>
<td>Pembina’s Safety, Environment and Security Plan</td>
</tr>
<tr>
<td>VLGC</td>
<td>Very Large Gas Carriers – tanker ships designed to transport propane and similar products</td>
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<tr>
<td>WCSB</td>
<td>Western Canadian Sedimentary Basin</td>
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### MEASUREMENT CONVERSIONS

<table>
<thead>
<tr>
<th>Unit</th>
<th>Conversion</th>
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<tr>
<td>1 liter</td>
<td>0.264 U.S. gallons</td>
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<tr>
<td>1 U.S. gallon</td>
<td>3.785 liters</td>
</tr>
<tr>
<td>1 barrel (petroleum)</td>
<td>42 U.S. gallons</td>
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<tr>
<td>1 tank car</td>
<td>725 barrels or 30,450 U.S. gallons (approx.)</td>
</tr>
<tr>
<td>1 unit train</td>
<td>75,000 barrels or 3 million U.S. gallons (approx.)</td>
</tr>
<tr>
<td>1 cubic meter (m³)</td>
<td>264.172 U.S. gallons</td>
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**CONTACT INFORMATION**

Pembina values your input. If you have questions, comments or want additional information please contact us at:

- Pembina’s Toll-Free Project Line: **1-888-920-1979**
- Project Email: propaneterminal@pembina.com