Enterprise Risk Management (ERM) Pilot Project
Harbor Services Group

Summary Report to Port Audit Committee

October 5, 2010

Enterprise Risk Management

A process applied across an enterprise designed to identify potential events that may affect the entity's strategies and objectives; assess the risks of the identified events; and to provide a consistent framework with which to manage the most significant risks in order to provide reasonable assurance to management regarding the achievement of its objectives.

Key Points:

- It is a process implemented within the entity
- Aligns to support and help achieve entities' strategies and operations
- Helps to prioritize risks based on entities' tolerance to risk
- Evaluates risks based on likelihood and impact
- Includes governance, audit, and compliance
- Recognizes that risk has both an upside and a downside
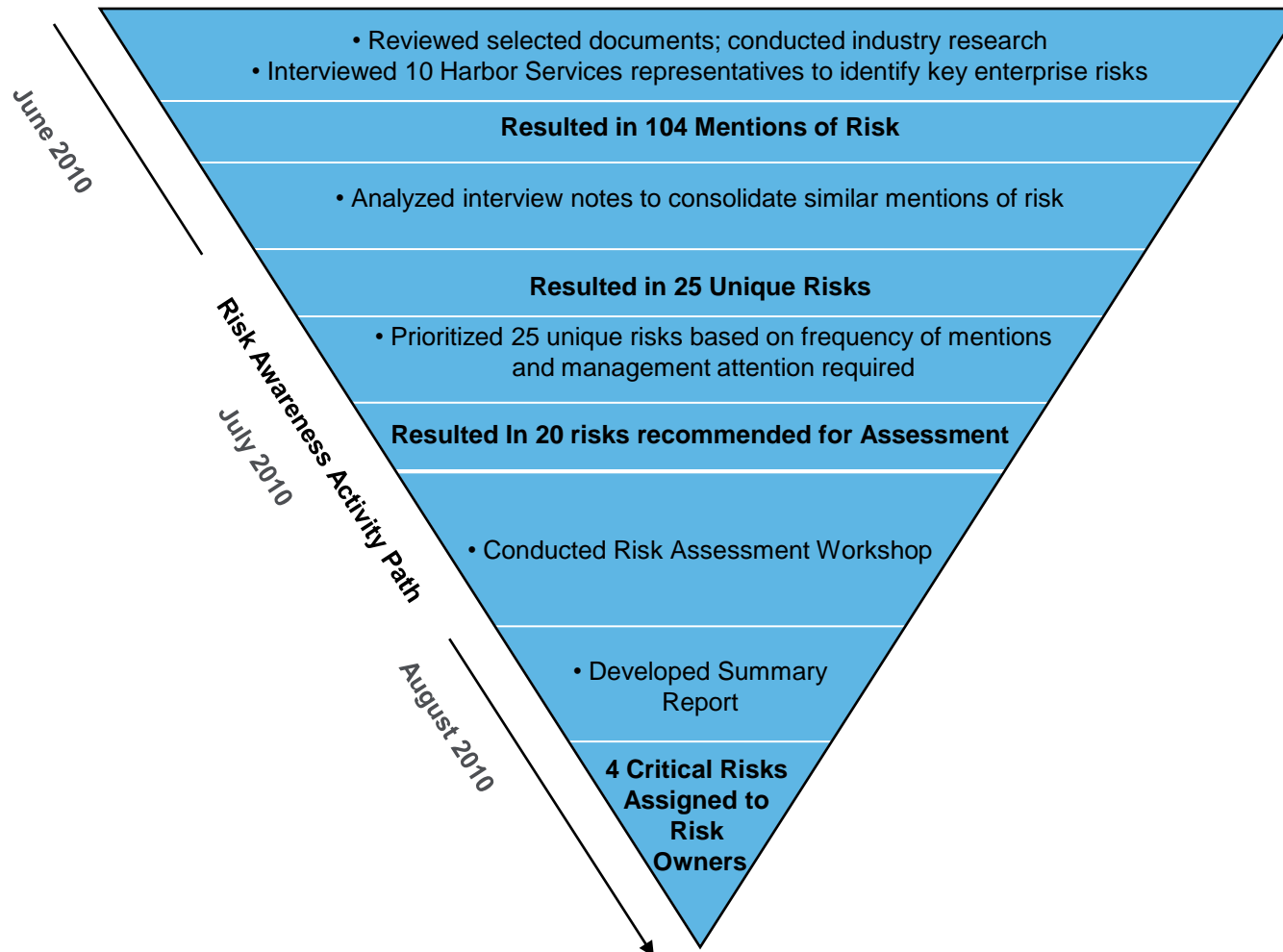- Creates a common risk assessment platform

1. **Port selected Harbor Services Group as the pilot group to evaluate ERM**

2. **Port selected Aon Risk Services as the consultant to assist with pilot study**

3. **Port assembled internal team to run the project**

4. **Interviews conducted of Harbor Services management by consultants June 29-30th**

5. **104 risks defined based on interviews and consolidated by consultant and Port team to 25 risks**

6. **The 25 risks further refined to 20 risks by Port and consultant**

7. **A facilitated workshop conducted on August 5th to rank risks based on impact and likelihood**

8. **The Executive Team briefed on September 10th on the results of the pilot study**

9. **Port received final draft of report from Aon on September 23rd**

10. **Presentation to Audit Committee on October 5th**

Focusing on the Most Critical Risks to the Harbor Services Group

June 2010

July 2010

August 2010

Risk Awareness Activity Path

• Reviewed selected documents; conducted industry research
• Interviewed 10 Harbor Services representatives to identify key enterprise risks

Resulted in 104 Mentions of Risk

• Analyzed interview notes to consolidate similar mentions of risk

Resulted in 25 Unique Risks

• Prioritized 25 unique risks based on frequency of mentions and management attention required

Resulted In 20 risks recommended for Assessment

• Conducted Risk Assessment Workshop

• Developed Summary Report

4 Critical Risks Assigned to Risk Owners

#	Risk Name	#	Risk Name
1	Access to Capital	11	Land Use / Zoning
2	Budgeting	12	Legal & Regulatory Compliance
3	Commercial Fishing Industry	13	Litigation
4	Competition	14	Maintenance
5	Customer Service	15	Marketing
6	Economy	16	Natural Disasters/Cat. Events and Business Continuity
7	Employee Costs	17	Political Relations
8	Environmental Regulations	18	Public Relations
9	Hiring & Retention	19	Safety & Security
10	Internal Port Support Services	20	Strategic Business Model

Note: Risks are listed in alphabetical order; additional information for each risk can be found in the detailed risk overviews
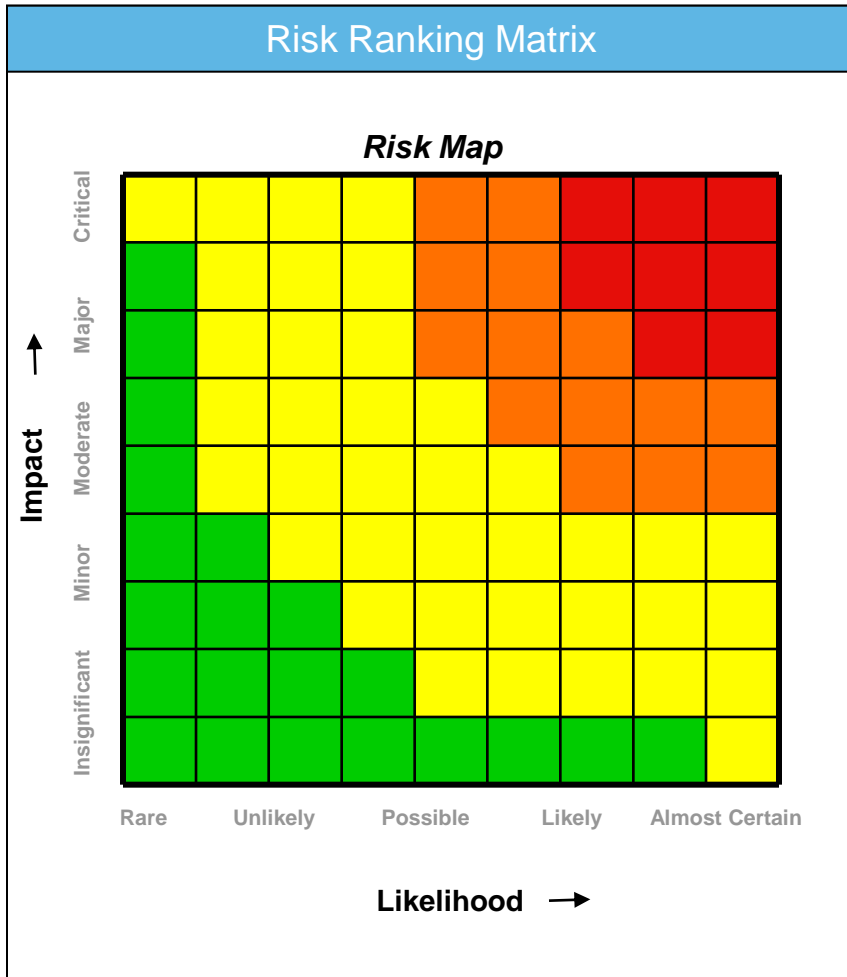
Workshop participants assessed each risk on two criteria:

- The estimated likelihood of a risk's occurrence within the next 18-24 months
- The estimated impact on finances, operations, the community, and the environment .

Port of Seattle

Initial Prioritization Based Upon Assessments of Impact and Likelihood

Risk Ranking Matrix

Risk Map

Impact (axis): Critical, Major, Moderate, Minor, Insignificant

Likelihood (axis): Rare, Unlikely, Possible, Likely, Almost Certain

Risk Ranking Overview

- Risk Ranking provides an initial means of prioritizing assessed risks based upon assessments of Impact and Likelihood
- Risk Rankings are used to identify a risk's position on a Risk Map (see chart to left)

Risk Ranking Calculation Steps

- Multiply the Impact assessment (on a scale of 1-9 with 9 being the highest impact and 1 being the lowest) and the Likelihood assessment (on a scale of 1-9 with 9 being the highest likelihood and 1 being the lowest) for each risk
- Reference the product against a range of values (see table below)

Risk Rankings	
Risk is ranked as…	*…if the product of Impact & Likelihood is…*
VERY HIGH	Greater than **49.0**
HIGH	Greater than **27.0**, but less than **49.0**
MEDIUM	Greater than **9.0**, but less than **27.0**
LOW	Less than **9.0**

Risk Assessment & Prioritization Workshop Results
Harbor Services Enterprise Risk Map

Harbor Services: Enterprise Risk Map

(Axis labels: Impact (vertical), Likelihood (horizontal))
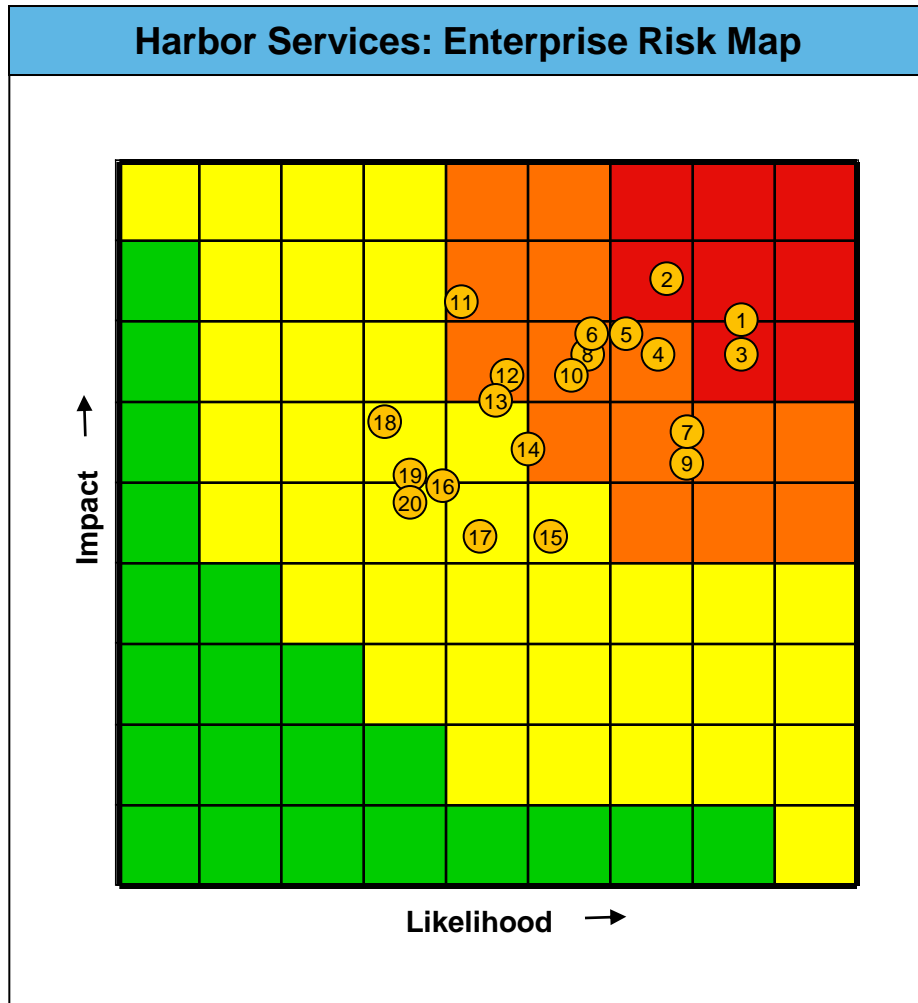
Rank	Risk Name	Risk Ranking
1	**Land Use / Zoning***	53.20
2	Environmental Regulations	50.25
3	Political Relations	49.40
4	**Maintenance***	43.55
5	Commercial Fishing Industry	42.84
6	**Access to Capital***	40.12
7	Internal Port Support Services	38.64
8	Strategic Business Model	37.05
9	Litigation	35.88
10	**Legal & Regulatory Compliance***	35.28
11	Natural Disasters, Cat. Events and Business Continuity	30.24
12	Economy	29.61
13	Competition	27.60
14	Public Relations	27.00
15	Budgeting	22.79
16	Employee Costs	19.11
17	Marketing	18.92
18	Customer Service	18.81
19	Safety & Security	18.36
20	Hiring & Retention	17.28

Note: Risks are listed in the order of Risk Ranking; additional information for each risk can be found in the detailed risk overviews

Port of Seattle

Definition

Risk of conflict between zoning laws / regulations and Port's desired or intended use for that land

Risk Drivers

- Reliance on other's jurisdiction or the City for the revision of land use
- Restrictions on the use of and improvements to land
- Uncertainty of changing laws and regulations
- Threat of re-zoning negatively affecting the Port

Existing Risk Management Activities

- Ensuring frequent and regular contact with internal lobbyists and contractors at the state and federal level to ensure we know of proposed and actual changes to zoning laws and regulations.

Risk Assessment Results: Risk Map

Risk Assessment Results: Details

Likelihood	Impact	Risk Ranking
7.6	7.0	53.20

Environmental Regulations

Definition

Risk of not staying current with or non-compliance with existing or new environmental regulations or failing to identify changes in federal, foreign, state and/or local regulations

Risk Drivers

- Challenges to adapting to changes in environmental regulations (ex. gray water rule)
- Demand on resources to comply with environmental regulations (recovering sunken boats, walking the docks, etc.) competes with using those resources elsewhere.
- Escalating costs of compliance
- Threat of legal action against the Port

Existing Risk Management Activities

- Existing response programs in place to respond to an event
- Keeping facility inspections up to date

Risk Assessment Results: Risk Map

Risk Assessment Results: Details

Likelihood	Impact	Risk Ranking
6.7	7.5	50.25