

UNIT 1 TOPIC 1

OPERATIONAL RISK MANAGEMENT – SAFE DRIVING

ENABLING OBJECTIVES:

- 1.1.1 Define the terms related to ORM.
- 1.1.2 Apply the ORM five-step process to driving.
- 1.1.3 Describe the basic Operational Risk Management (ORM) principles.
- 1.1.4 Define how Core Values support the ORM process and safe driving.

REFERENCES:

1. OPNAVINST 3500.39
2. www.safetycenter.navy.mil
3. OPNAVINST5100.12F
4. <http://www.nhtsa.dot.gov/>

SLIDES:

- 1-1-1 Operational Risk Management (ORM) and Safe Driving
- 1-1-2 Why ORM?
- 1-1-3 ORM Terms
- 1-1-4 ORM Process
- 1-1-5 RAC Matrix
- 1-1-6 ORM Principles
- 1-1-7 Safe Driving ORM
- 1-1-8 Why ORM My Driving?
- 1-1-9 Navy Personnel Driving Statistics
- 1-1-10 Safe Driving Scenario
- 1-1-11 Identify the Hazards
- 1-1-12 Assess the Hazards

- 1-1-13 Make Risk Decisions
- 1-1-14 Implement Controls
- 1-1-15 Supervise
- 1-1-16 Take Away
- 1-1-17 Core Values and ORM Principles
- 1-1-18 Summary

CASE STUDIES:

None

VIDEO TAPES:

None

NOTES TO THE FACILITATOR:

The main points of this topic are:

- The basic Operational Risk Management (ORM) principles
- The ORM five-step process and its application to safe driving
- How core values support the ORM process and good traffic safety habits

I. INTRODUCTION

- A. Uncertainty and risk are inherent in the nature of military action. The success of the Naval Services is based upon a willingness to balance risk with opportunity in taking the bold and decisive action necessary to triumph in battle.
- A. Operational Risk Management is an effective tool for maintaining readiness in peacetime and success in combat without infringing upon the prerogatives of the Commander. In other words, it is the process of dealing with risk associated with military operations.
- B. Since 1991, Operational Risk Management applied both in day-to-day operations and during crisis periods, has produced dramatic results in reducing these losses.
- C. Operational Risk Management not only applies to operational use, but has equal application to many types of activities where there is risk associated. The risks involved in driving makes it an ideal candidate for the Operational Risk Management (ORM) process.
- D. This lesson will outline the ORM principles and process that may be applied to any situation to achieve better results and minimize problems. We will also practice using what we learned by taking a real-world scenario and applying the ORM principles and process.

SHOW SLIDE 1-1-1 OPERATIONAL RISK MANAGEMENT (ORM) TRAFFIC SAFETY

SHOW SLIDE 1-1-2 WHY ORM?

- E. Why use ORM when driving? Take a look at these statistics.
1. In 1999, there were an estimated 6,289,000 police reported traffic crashes in which 41,345 people were killed and 3,200,000 people were injured.
 2. The risk of crash involvement per mile driven among drivers 16-19 years old is 4 times the risk among older drivers.
 3. In 1998, an average of 114 persons died each day in motor vehicle crashes – one every 13 minutes.

II. ORM TERMS

- A. **Hazard** - A condition with the potential to cause personal injury or death, property damage, or mission degradation.
- B. **Risk** - An expression of possible loss in terms of severity and probability.
- C. **Risk Assessment** - The process of detecting hazards and assessing associated risks.
- D. **Operational Risk Management (ORM)** - The process of dealing with risk associated with military operations, which includes risk assessment, risk decision making, and implementation of effective risk controls.

SHOW SLIDE 1-1-3 ORM TERMS

III. ORM PROCESS

A. The five-step process is:

1. **Identify Hazards** – Begin with an outline or chart of the major steps in the operation. Next, conduct a Preliminary Hazard Analysis by listing all of the hazards associated with each step in the analysis along with possible causes for those hazards.
2. **Assess Hazards** – For each hazard identified, determine the associated degree of risk in terms of probability and severity.
 - a. Note the chart and the Risk Assessment Codes – (RAC)
 - 1 = Critical
 - 2 = Serious
 - 3 = Moderate
 - 4 = Minor
 - 5 = Negligible
 - b. Then review the Categories shown in the graphic.

CAT I = Death, loss of asset
CAT II = Sever, injury/degradation of asset
CAT III = Minor, injury degradation of asset
CAT IV = Minimal, injury degradation of asset

SHOW SLIDE 1-1-4 ORM PROCESS

SHOW SLIDE 1-1-5 RAC MATRIX

- c. Then review the Probability of Occurrence.
 - Likely Immediate
 - Probably will occur in time
 - May occur
 - Unlikely to occur
 - d. Use the RAC matrix to assign codes to each hazard.
3. **Make Risk Decisions** – This step involves prioritizing the hazards based on the assessment made in Step 2.
- a. First, develop risk control options.
 - b. Start with the most serious risk.
 - c. Select controls that will reduce the risk to a minimum consistent with mission accomplishment.
 - d. With selected controls in place, decide if the benefit of the operation outweighs the risk.
 - e. If risk outweighs benefit or if assistance is required to implement controls, communicate with higher authority in the chain of command.

4. **Implement Controls** – The following measures can be used to eliminate hazards or reduce the degree of risk. These are listed by order of preference.
 - a. **Engineering Controls** – Controls that use engineering methods to reduce risks by design, material selection, or substitution when technically or economically feasible.
 - b. **Administrative Controls** – Controls that reduce risks through specific administrative actions, such as:
 - (1) Providing suitable warnings, markings, placards, signs, and notices.
 - (2) Establishing written policies, programs, instructions and standard operating procedures (SOP).
 - (3) Training personnel to recognize hazards and take appropriate precautionary measures.
 - (4) Limiting the exposure to a hazard (either by reducing the number of personnel/assets or the length of time they are exposed).
 - c. **Personal protective equipment** – Serves as a barrier between personnel and a hazard. It should be used when other controls do not reduce the hazard to an acceptable level.

5. Supervise

- a. Conduct follow-up evaluations of the controls to ensure they remain in place and have the desired effect.
- b. Monitor for changes that may require further Operational Risk Management.
- c. Take corrective action when necessary.

IV. ORM PRINCIPLES**A. ORM incorporates the following four principles:**

1. **Accept risk when benefits outweigh the cost.**
 - a. FMFM (War fighting) states, “Risk is inherent in war and is involved in every mission. Risk is also related to gain; normally greater potential gain requires greater risk.”
 - b. Our naval tradition is built upon principles of seizing the initiative and taking decisive action.
 - c. The goal of Operational Risk Management is not to eliminate risk, but to manage the risk so that the mission can be accomplished with the minimum amount of loss.
2. **Accept no unnecessary risk.**
 - a. FMFM 1 also states, “We should clearly understand that the acceptance of risk does not equate to the imprudent willingness to gamble . . .”

SHOW SLIDE 1-1-6 ORM PRINCIPLES

- b. Take only risks that are necessary to accomplish the mission.
- 3. **Anticipate and manage risk by planning.**
 - a. Risks are more easily controlled when they are identified early in the planning process.
- 4. **Make risk decisions at the right level.** Risk management decisions are made by the leader directly responsible for the operation.
 - a. Prudence, experience, judgment, intuition and situational awareness of leaders directly involved in the planning and execution of the mission are the critical elements in making effective risk management decisions.
 - b. When the leader responsible for executing the mission determines that the risk associated with that mission is too high or goes beyond the commander's stated intent, he should seek additional guidance.

V. SAFE DRIVING ORM

- A. ORM is a proven successful tool for operational use, but it has equal application to many types of activities where there is risk associated. A good and needed example is driving safety. Let's look at how ORM might be applied in safe driving.
- B. Why use ORM for driving?
 - 1. Motor vehicle crashes are the leading cause of death for every age from 5-29 years old.

SHOW SLIDE 1-1-7 SAFE DRIVING ORM

SHOW SLIDE 1-1-8 WHY ORM MY DRIVING?

2. Vehicle occupants accounted for 85.3 percent of traffic fatalities in 1998. The remaining 14.7 percent were pedestrians, pedalcyclists, and other nonoccupants.
3. The Naval Safety Center calls driving safety our # 1 readiness issue.
4. FY99 Navy Military Personnel casualties in Navy Private Motor Vehicle Mishaps

	Total	Partial	Major
	Fatalities	Disabilities	Injuries
Cars/trucks/etc.	51	3	113
Motorcycles	15	1	38
Pedestrians/cyclists	5	0	17
Total	71	4	168
Alcohol-Related Mishaps			
	25	2	29
95 – 99 Summary*	366	26	1,221

* Includes Navy military operators, passengers, pedestrians, bicyclists, and joggers

SHOW SLIDE 1-1-9 NAVY PERSONNEL DRIVING STATISTICS

VI. SCENARIO

- A. Now that we have discussed the process and principles of ORM, let's apply these to a real-world situation.
- B. Scenario:
 - Captain Williams has made it known he intends to exercise his considerable authority and secure training at 1500 on Friday, for a well deserved three day weekend.

SHOW SLIDE 1-1-10 TRAFFIC SAFETY SCENARIO

Facilitator Note: Break the students into four or five groups and have them analyze the scenario using the five step ORM process. After a few minutes of group work, bring the class back together and have each group report out how they applied the ORM process.

Accordingly, you are planning a trip to Charleston, SC to visit family, friends, the Battery, Rainbow Row, Middleton Gardens and experience southern hospitality and ambience.

Your plan is to leave as soon as possible after 1500 because the 525 mile trip will take at least 9 hours.

C. Many of you may have been confronted with a situation similar to this one before. If not, chances are you will be during your military career. So, let's walk through the 5 step ORM process as it applies to this scenario.

D. Step 1 - **Identify the Hazards**- Think about the following questions as you analyze step 1: What could go wrong on this trip you're about to take? How could it be prevented?

- 1. Fatigue
- 2. Equipment breakdown
- 3. Drunk drivers
- 4. Speeding
- 5. Directionally challenged
- 6. Road construction
- 7. Weather

E. Step 2 - **Assess the Hazards**- Use the RAC matrix we previously discussed to assign codes to your hazards.

- 1. Fatigue I/C (2)
- 2. Equipment Breakdown II/C (3)
- 3. Drunk Drivers I/C (2)

SHOW SLIDE 1-1-11 IDENTIFY THE HAZARDS

Facilitator Note: Some of the more basic and obvious hazards are listed. Ask the class for others that are not on the list. Others include running out of money, not getting back in time for work on Monday, or getting a DUI.

SHOW SLIDE 1-1-12 ASSESS THE HAZARDS

Facilitator Note: Assess the hazards identified in step 1 in terms of severity and probability. You can see this is a pretty subjective exercise, however, the most severe

DISCUSSION POINT

RELATED INSTRUCTOR ACTIVITY

- 4. Speeding I/A (1)
- 5. Directionally challenged IV/C (5)
- 6. Road construction III/C (4)
- 7. Weather II/C (3)

G. Step 3 - **Make Risk Decisions**- Prioritize the hazards based on the assessment in Step 2 and then determine if there are any hazards that present risk of sufficient magnitude to cancel, postpone, or revise the planned trip.

<u>Hazard</u>	<u>RAC</u>
Speeding	1
Fatigue	2
Drunk Drivers	2
Weather	3
Equipment breakdown	3
Road construction	4
Getting lost	5

H. Step 4 - **Implement Controls**- What can be done to eliminate hazards or reduce the degree of risk.

<u>Hazards</u>	<u>Controls</u>
Speeding	Know and obey limits.
Fatigue	Rest, adjust start time.
Drunk drivers	Leave early morning.
Weather	Monitor weather channel.
Equipment b-down	Inspect vehicle and make repairs before trip.

hazards and those more likely to occur consistently receive the lower RACs, so don't worry about the numbers too much.

SHOW SLIDE 1-1-13 RISK DECISIONS

Facilitator Note: After determining the hazards that are have the biggest risk, discuss if the trip should be postponed, cancelled, or revised based on these hazards. Who should make that decision?

SHOW SLIDE 1-1-14 IMPLEMENT CONTROLS

Facilitator Note: Only a few of the more important controls are listed. Ask the students to give other controls they identified within their groups.

I. Step 5 – **Supervise**- The importance of management’s involvement cannot be over stated. It is essential to the success reducing risks. There is plenty that can be done to avoid senseless mishaps, in addition to avoiding those that are easily prevented. Through all of this, leadership commitment is the single most important and essential ingredient. Let’s look at what supervision can be done in this scenario.

1. Command sponsored vehicle inspections for those planning long distance trips.
2. Mandatory completion of driver mishap risk indicator form.
3. Pre-holiday safety standdown.
4. Evaluate and adjust controls as the situation changes.
5. Ensure personnel are familiar with their situation.
6. Watch for changes.

J. **Scenario Summary**- Some of you have know about and practiced the ORM process. Others, this is the first time you have been introduced to it. If you remember nothing else from this lesson, remember to ask these three crucial questions.

1. What can go wrong?
2. What am I going to do about it?
3. If I can’t do anything, where do I go?

SHOW SLIDE 1-1-15 SUPERVISE

Facilitator Note: Allow students to add suggestions to list based on their group discussion.

SHOW SLIDE 1-1-16 TAKE AWAY

VII. CORE VALUES AND ORM

- A. Linking the ORM principles with the Navy Core Values reminds us to:
1. Accept risk when benefits outweigh the cost.
 - Honor – To be accountable for our actions
 - Courage – To stand tough in the face of adversity
 - Commitment – To be there for your shipmates
 2. Accept no unnecessary risk.
 - Honor – To ‘work smart’
 - Courage – To avoid shortcuts/steps that may cause injury or damage
 - Commitment – Minimize risk taking when unnecessary
 3. Anticipate and manage risk by planning.
 - Honor – Planning ahead to lessen any potential hazard
 - Courage – Taking the time to plan
 - Commitment – Asking yourself the right questions when faced with risk choices
 4. Make risk decisions at the right level.
 - Honor – To support the chain of command up and down the line

SHOW SLIDE 1-1-17 CORE VALUES AND ORM PRINCIPLES

- Courage – To know that you have choices
- Commitment – To do the right thing

VIII. SUMMARY

- A. This lesson has covered
1. ORM terms.
 2. The basic Operational Risk Management principles.
 3. The ORM five-step process and its application to safe driving.
 4. The basics of driving safely.
 5. How core values support the ORM process and safe driving habits.

SHOW SLIDE 1-1-18 SUMMARY