

MARITIME

FOCUS ON RISK MANAGEMENT TOOL

VESSEL MONITORING AND VOICE ALERTING SYSTEM

The 44th session of IALA VTS Committee

CHINA MSA

2017-9-26

OUTLINE

1

**Intention
Why?**

**Principle and Features
How?**

2

3

**Functions
What?**

Conclusion

4

Principle

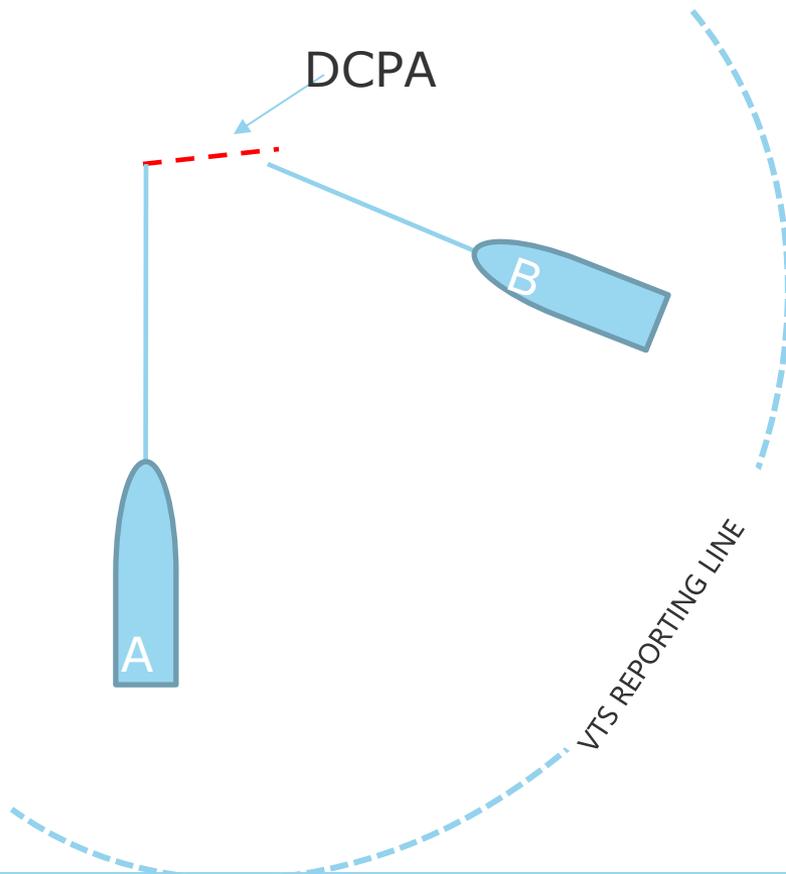


Features

- ◇ Risk calculation and analysis of ship navigation.
 - collision
 - overspeed
 - approach to the special area
- ◇ Classified and filtered risk information intelligently according to **different areas** or **different types of vessels**.
- ◇ Transformed useful warning information into speech signal using **text-to-speech technology**.
 - Chinese
 - English
- ◇ **Hardware** was designed to control VHF to broadcast navigational information or warnings to all ships in VTS area.

Function Introduction

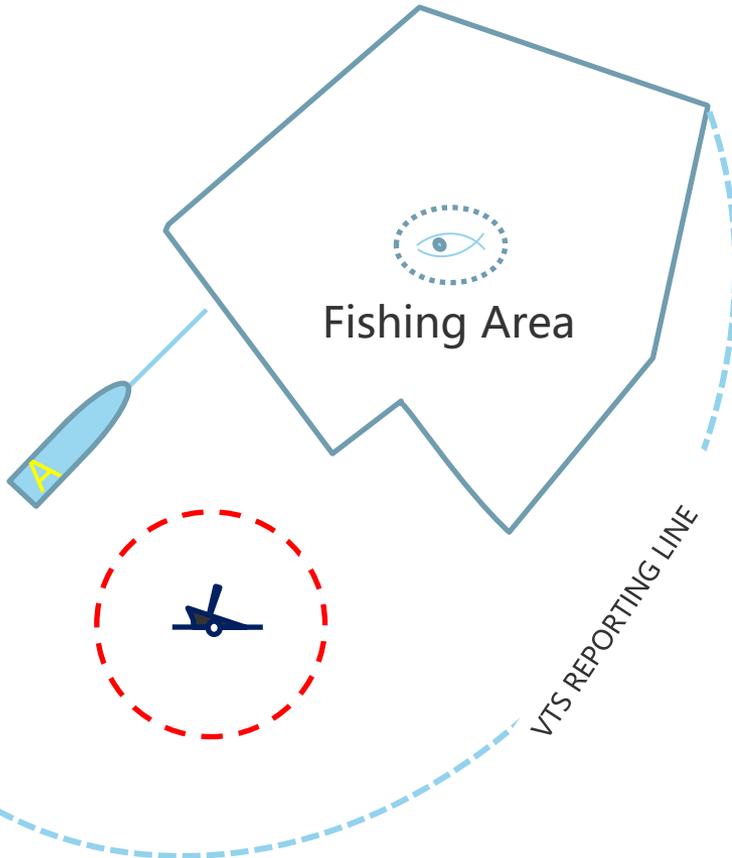
Ship A and ship B are in dangerous of collision.



The VMVA system calculates the **DCPA** (Distance of the Closest Point of Approach) and **TCPA** (Time to Closest Point of Approach) between two ships which are taken as the collision risk index. When the index reaches a preset threshold value, the system will remind vessels automatically through VHF radio.

Function Introduction

Ship A is approaching to the fishing area.



When the ship is approaching the special area, like fishing area, restricted navigational area or dangerous shallow water area, the system will give warning that the ship should keep away from these areas to avoid accidents.



REPLAY ACTIVE: 01.09.2017 08:27:34 (R)

回放

目标搜索

硬盘上有可重放的数据

从 01.09.2017 08:27:34

重放时间 01.09.2017 08:27:34

01.09.2017 08:27:34

LAT: 39.05 433 N LON: 119.21 236 E

JILUANYU 04007

JILUANYU 03515

SPACEON_GRACE

LUSHOUYU65235

JI LE YU 01234

LURUYU64625-03

JILUANYU 03045

NET MARK-03258-5

55666-3

SPACEON_GRACE 5566-03

JI LE YU 3018

JILEYU03285

JILU 0001

JILEYU3289

JIFENGYU 03033

WRECK

JILAOUYU 01187

KYLA FORTUNE

JILAOUYU 08118

JILAOUYU 03123

JILAOUYU 03163

JILAOUYU 03193

JILAOUYU 03303

JILAOUYU 03136

JILAOUYU 0347

JILUANYU 03101

JILUANYU 03102

JILUANYU 03103

JILUANYU 03104

JILUANYU 03105

JILUANYU 03106

JILUANYU 03107

JILUANYU 03108

JILUANYU 03109

JILUANYU 03110

JILUANYU 03111

JILUANYU 03112

JILUANYU 03113

JILUANYU 03114

JILUANYU 03115

JILUANYU 03116

JILUANYU 03117

JILUANYU 03118

JILUANYU 03119

JILUANYU 03120

JILUANYU 03121

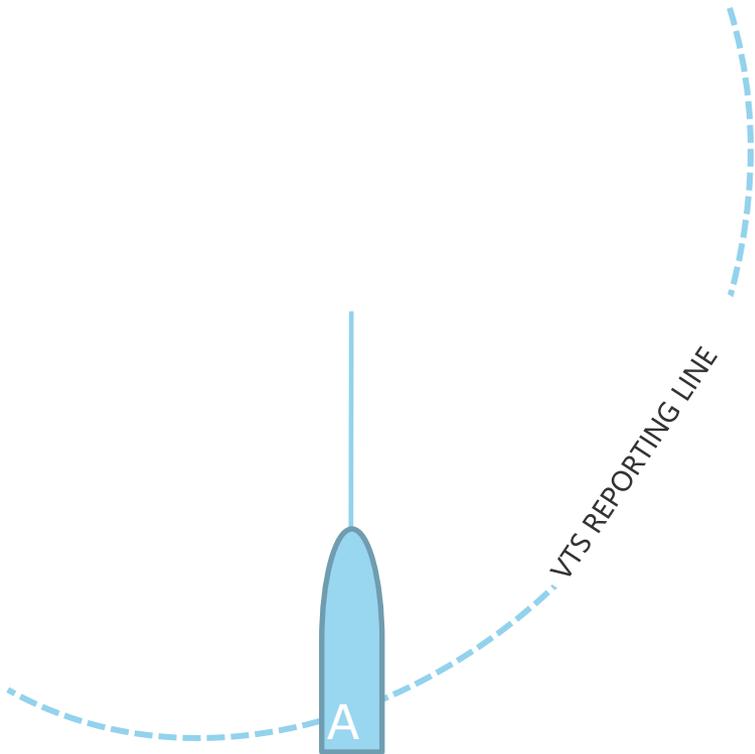
JILUANYU 03122

Function Introduction

Ship A is passing reporting line.



Alert of passing the reporting line



When the ship is passing the VTS reporting line, the system will alert the ship should report to VTS center.

Function Introduction

Broadcasting service information periodically



The VMVA system could also disseminate the maritime safety information, including navigational and meteorological warnings, maritime rescue messages, and so on. The system will transform the texts into spoken languages, and broadcast automatically based on pre-set time interval.

2016-6-4 16:58:56 重点关注船舶鸿阳山已进入报告线

17:00:09

定时广播

创建方案 立即广播

中文

英文

大雾
大风1
大风2
渔船2016224 (限次-有效)

立即广播

立即停止

ENHANCE MARITIME SAFETY

The VMVA system was completed in Dec 2015, and has been successfully running as an effective monitoring tool in VTS daily work. In VTS area of Tangshan Port, the system broadcasts more than 160 useful navigational warnings per day. By using the system, the efficiency of ship supervision is greatly improved, the safety of life and navigation at sea are enhanced, and the labor intensity of VTS operators is reduced.



Looking forward to your cooperation!



The VMVA system has been used in VTS centers in **seven** Chinese ports. And **Certificate of Utility Model Patent** is granted by state intellectual property office of China.

FOCUS ON RISK MANAGEMENT TOOL

VESSEL MONITORING AND VOICE ALERTING SYSTEM

The 44th session of IALA VTS Committee

Tel: +86 0315 5365084

Email: ysjab@163.com

CHINA MSA