



December 13, 2002

MR'S ADVISORY TO SHIPPING No. A-43-2002

TO : All Steamship Agents, Owners, and Operators

SUBJECT: Monthly Canal Operations Summary – NOVEMBER 2002

1. Statistical Summary:

- a. Transit Pilot Force 282
- b. Pilots in Training 0
- c. Tugs 23
- d. Locomotives 100
- e. Traffic Statistics (Preliminary):

	<u>Average Daily</u>	<u>High Daily</u>	<u>Low Daily</u>
Arrivals	31.4	42.0	16.0
Oceangoing Transits (Includes Handlines)	30.9	41.0	22.0
Canal Waters Time (Hrs.)	27.6	50.7	16.5
In-Transit Time (Hrs.)	10.7	14.4	7.3
	<u>Total</u>	<u>Supers</u>	<u>Regulars</u>
Bookings	416	264	152

2. Scheduled Locks Outages:

TENTATIVE SCHEDULE OF LOCKS OUTAGES FOR FISCAL YEAR 2003						
Dates	No. of Days	Miraflores	Pedro Miguel	Gatun	Daily Transit Capacity	Status
Dec. 18 - 19, 2002	2	Lane Outage			30 – 32	Confirmed
Jan. 15 - 16, 2003	2	Lane Outage			30 – 32	Tentative
Jun 2 - 12, 2003	11		Lane Outage		30 – 32	Tentative
Jul 7 - 17, 2003	11	Lane Outage	Culvert Outage (8d)		28 – 30	Tentative
Aug 11 - 22, 2003	12		Lane Outage	Lane Outage(7d)	26 – 28	Tentative
Sept 15 - 26, 2003	11	Lane Outage		Lane Outage	26 – 28	Tentative

Note: Whenever a set of locks requires a major outage of one of its two lanes for dry chamber inspection, miter gate repairs, tow track work or other major maintenance/improvement projects, advantage may be taken of this requirement to perform simultaneous single lane outages for additional maintenance at other locks.

Transit Capacity: The normal capacity of the Panama Canal is 38 vessel transits per day. This capacity is reduced during locks outages, as indicated in the above table. Consequently, vessels may experience delays in transiting. Normally, during these periods, the Panama Canal Vessel Transit Reservation System slots are fully utilized. Two-day lane outages have no significant impact on Canal vessel backlog.

- 3. See reverse for items of interest to the shipping community.
- 4. This advisory will be canceled for record purposes on December 31, 2002.

ORIGINAL SIGNED

Jorge L. Quijano
Maritime Operations Director

ITEMS OF INTEREST FOR THE SHIPPING COMMUNITY

Canal Performance

In November 2002, oceangoing transits totaled 926, or a daily average of 30.9. Transits by wide-beam vessels (30.48 meters/100 feet in beam and over) totaled 397, or 42.7 percent of all oceangoing transits. The average Canal Waters Time (CWT) was 27.6 hours.

Sector lights installed in Culebra Cut

Just as streetlights show the way for drivers on the street, ranges at the Cut guide pilots while navigating. Since the construction of the Panama Canal, these aids to navigation have been used to align vessels with the center of the navigational channel and the center of each “lane.” Traditionally, ranges have used at least two reference points to align vessels; however, as a result of the widening of Gaillard Cut, innovations were integrated to the Panama Canal’s range system.

A modern sector light system is currently under installation on the sailing ranges of Culebra Cut, which could enable the alignment of vessels in the Cut using only one reference point. These sector lights are designed to enhance the precision of the ranges in order to assist vessels while meeting in the Culebra Cut. A sector light generates a beam that passes through red, white, and green color filters. It uses an oscillation mechanism to produce seven light sectors: flashing red, fixed red, flashing white-red, fixed white, flashing white-green, fixed green, and flashing green. The observer sees each sector depending on his or her relative position in the channel. The fixed red light tells the pilot that the vessel is close to the *central navigation line*, while the fixed white light indicates that the vessel is on the *navigation line*. The fixed green light indicates that the vessel is close to the shore. The pilot must keep the vessel within the white sector whenever there is another vessel transiting in the opposite direction.

How does the pilot know that he is exactly aligned with the *center* or *navigation lines*? Signaling leader Ricardo Gutiérrez from the Dredging, Signaling, and Crane Division says, “If the pilot sees the fixed white light, he is aligned with the *navigation line*. When the vessel begins to move from the *navigation line* to shore, the pilot shall see a flashing light that turns white and green at moments. If the vessel moves from the *navigation line* to the *centerline*, he or she will see a flashing white and red light. This is how the pilot can tell where he or she is.”

Sector lights are installed so that pilots traveling in opposite directions may be aware of how much space they have available to maneuver their vessels. These lights are designed for use day and night. In addition to sector lights, the ranges have been fitted with a vertical line of lights for nighttime use where the amber lights indicates the *centerline* and the green lights marks the *navigation line*, therefore, increasing transit safety.

Dredging, Signaling, and Crane Division personnel are installing the sector lights with the support of Surveillance and Cartography Section personnel. This section marks the light’s arc of visibility and establishes reference points that corroborate the correct orientation. The project was launched in Bas Obispo and Las Cascadas reaches, and four out of 14 lights have already been installed.

According to Gutiérrez, sector lights offer greater precision and visibility. Dredging, Signaling, and Crane Division electrician foreman Rosa Espino highlighted that “These lights will be useful because they will enable the passage of vessels with added precision, thus enhancing safety through the Cut, which is the Canal’s narrowest point.”