MEMORANDUM FOR: GOES Data Collection System (DCS) Users

FROM: Kay Metcalf

GOES DCS Operations Manager

SUBJECT: Minutes of the 92nd GOES DCS Technical Working Group

Meeting, July 19, 2000

I. Opening Remarks - Kay Metcalf, DCS Operations Manager (NESDIS/DSD)

The 92nd meeting of the DCS Technical Working Group (TWG) was called to order at 9:00 a.m. and hosted by the U.S. Army Corps. Of Engineers. The TWG was well attended with twentynine attendees representing the United States, and Canada. Additionally, there were five representatives from the private sector.

Welcoming remarks were given by Kay Metcalf who is the NOAA/DCS Operations Manager. Kay, on behalf of the DCS/TWG thanked the Corps. of Engineers for hosting the STIWG and TWG meetings. Kay then introduced representatives from Stevens Engineering, Vaisila, and C. C. Lunch Associates representing OTT, all of whom either manufacture or sell Data Collection Platforms.

Dave Wingerd, representing the Army Corps. of Engineers, introduced the hosting Corps. members and gave a brief description of the Columbia River Basin facility. Dave then introduced Bill Branch of the North Western Division of the Army Corps. Bill introduced the group to some of their work using 450 DCPs with the Columbia River run-off which is half as large as the Mississippi River.

Kay Metcalf next reviewed the minutes from the previous meeting, and reminded all that the TWG Minutes are now being posted on the Internet Web site http://noaasis.noaa.gov/. Kay then reviewed the proposed meeting agenda with minor alterations from TWG members.

II. NESDIS Report

a. Spacecraft Status - Kay Metcalf (NESDIS/DSD)

Kay Metcalf gave a brief system report which stated that there were no major malfunctions. Users can go to the SOCC web site at http://www.osd.noaa.gov/index40.htm for up-to-date satellite information.

a. DAPS Upgrade - Al McMath (Wallops CDA)

Al Mcmath presented DAPS status and modifications that are underway at the Wallops CDA. ITC boards equipped for 256 potential Internet connections were installed with 128 of them being used initially. This was later reduced to 16 in an attempt reduce intermittent DAPs failures.

Al also discussed incompatibility problems associated with the DAPs high data rate (HDR) interface. He has had to make software changes to make the 300 and 1200 bps DAPS interface match the new HDR demods. Many software modifications have been necessary in order to get the system functioning. The new Improved Test Transmitter has also demanded DAPs interface changes. Additionally, a new EPROM was furnished by Vitel and installed to prevent DAPs buffer overflow while using the test transmitter.

Al gave the Internet address for getting DCS data (also included in the minutes of the 91st TWG meeting) at http://dcs.noaa.gov/.

c. Wallops CDA - George Linvill (Wallops CDA).

George reported on the recent Wallops CDA DAPs outages. He alluded to recent changes that have been made to the DAPs computers, namely, the addition of an Internet interface, High Data Rate interface, and Improved Test Transmitter (ITT). Recently, both systems have simultaneously crashed, resulting in some DCS data losses. The Wallops technicians took the system back toward the original state in an effort to solve the problems. They reduce the number of internet connections to sixteen. They also separated the 300 bps and 1200 bps demods. ITT connection cables were also changed. They thought that they had fixed the problems when the system again failed. George indicated that the Wallops CDA staff consider the problem as unsolved at that time.

George reported that the recently launched GOES 11 was being checked out. The Wallops CDA has two new hurricane proof antennae which also are being checked out, and are close to going on-line. He also made reference to the recent successful CDMA testing that was performed at the CDA.

George also reported that the Canadian manufacturer SEIMAC is in final stages of testing their high data rate hardware. They have requested and received one of the certification test sets.

III. Satellite Telemetry Interagency Working Group (STIWG) Report - David Wingerd (HQ/USACE).

Dave Wingerd presented the STIWG report. Dave is working on a resolution of the missing funds. A letter will be going out to DCS members with requirement details. The DOMSAT contract extension, at \$75,000, has generated a need for funds by the end of fiscal 2000 (9/30/00). Cy Settles contract is being finalized, and has already alleviated some of the prior vendor frustration. DAPS II is on schedule for a FY 2000 procurement award. Larry Cedrone is continuing to work on a set of "minimal" DCS format standards. Plans are for the next DOMSAT agreement, which will soon be advertised in the Commerce Business Daily, to be negotiated as a ten year contract.

IV. USGS LRGS Development/NOAA Installation - Al Mcmath (Wallops CDA)

Al Mcmath introduced the LRGS Client/Server interface concept which has been developed by Ernie Dryer, Mike Maloney, and Al. He presented a schematic of the basic LRGS based system that has been implemented at the Wallops CDA. Al then presented a demonstration of how the new system works. Al and Ernie Dryer will be sending an e-mail message within two weeks after the close of the meeting to DCS users announcing availability of the LRGS based internet facility. The data distribution point is physically just prior to the DOMSAT distribution. Ernie next gave a brief history of how and why the USGS chose to develop a CORBA type LRGS distribution network. An important benefit of the new USGS design is the ability to circumvent the obsolete "Franklin" board. At this point Phil Sielaff requested a simple one page description on how to move from the standard current RGS to the new USGS LRGS design. Ernie said that the new interface is modeled after the old ISI DOMSAT menu. He plans to start a web site for support of downloads, and other needed functions. Ernie then did a demonstration of message data retrieval and stated that he would soon be including a decoding scheme as well. He said that decoding software should be available by November 2000. The software will run on any JAVA supported machine, and client software is available as a download. (Additional information can also be found in the minutes of the prior TWG meeting.)

V. USACE Report - Bill Branch (USACE)

Bill Branch gave a very interesting presentation of the Corps.' work in support of the Columbia River Basin. The large run-off which is equal to 50% Mississippi River run-off includes about 20% storage by dams. They must accommodate environmental concerns with their basin management. Bill explained the existence of a United States/Canada Treaty controlling hydro power generation and distribution. Flood control systems are supported by dams in both countries. He showed the almost exhaustive lengths that they must go through for the fish migrations. He said that there are thirteen endangered fish species in the region.

VI. User Reports

Various users presented information on the number and use of DCPs in the many applications that

are characteristic of the DCS. Stan Silverman voiced a request for any old DCPs that users may have and not need. Any users who have such hardware should contact Stan. Mention was made by the Western DCS users of the important DCS support in fighting the ongoing forest fires, and protecting the men who are fighting the fires.

VII. Data and Time of Next TWG meeting

The tentative date for the next TWG meeting will be Thursday, October 19, 2000 at the NASA Center in Wallops, VA.