4. Effect of MTSAT Introduction

The introduction of MTSAT will give the following effects:

(1) Increased processing capacity
ATC separation can be reduced to a great extent, increasing the traffic handling capacity for the air route.

(2) Improvement of safety in lower altitude
The safety of flight will be dramatically improved, by supporting the aircraft in the low altitude airspace where the radar coverage is limited due to topographical shielding of the radio waves.

(3) Great improvements in communication quality
The satellite based high quality voice and data communication will replace the current HF communications of poor quality.

(4) Setting of flexible flight routes
The flight routes can be flexibly set, in order for the realization of efficient and economical flights.

5. Features of MTSAT

- The MTSAT system is in fully redundant configuration both in the satellites (MTSAT-1R and MTSAT-2) and the ground facilities (Kobe and Hitachi-Ota), giving high technical reliability.
- The MTSAT system conforms to the international standards having the interoperability with the existing satellite system (INMARSAT).
- The MTSAT system can be widely utilized by the ATC organizations and airline companies of the foreign states, being the aviation infrastructure serving the aeronautical traffic in the Asia-Pacific regions.