Swedavia Airports

The HIRO Concept

Paragraph AD 2 ESSA 7.1 in AIP Sweden states that High Intensity Runway Operations (HIRO) are applied at Arlanda.

The HIRO concept aims to reduce the aircraft spend time on the runway.

For arriving traffic, HIRO means that the pilot must prepare and plan to leave the runway without delay via high-speed exits (where available) as soon as possible after landing. Before landing, the pilot must prepare the choice of runway exit and after landing ensure that the speed is kept up until the aircraft has left the runway. At Arlanda, a landing aircraft is considered to have left the runway when it reaches 90 meters from the runway center line, or approximately 70 meters from the runway edge. The succeeding aircraft can be allowed to land or take off once that has happened. The time it takes for an aircraft to cross the runway threshold to it leaving the runway is called its Runway Occupancy Time (ROT). By minimizing this time, the ROT does not become a limiting factor for the distance allowed between aircraft on final and LFV's ability to apply minimum radar separation can be maintained.

HIRO is also important to be able to maintain a high departure capacity. For departing traffic, HIRO means that the pilot must be prepared to start his/her take-off roll without delay as soon as a take-off clearance has been received.

The application of HIRO to minimize ROT for both arriving and departing aircraft thus helps to ensure a maximum runway capacity and to avoid unnecessary go-arounds. It is important that each individual pilot is aware that HIRO is applied at Arlanda and what it means.

HIRO is not considered to have reached its full potential at Arlanda which is why LFV and Swedavia are conducting an information campaign aimed at airlines and pilots.