## FM 3036/AM 3038/AM 3084

## **Problem:**

In a rural village in Anuradhapura, 800 families were lived in. The homeowners of this village were introduced Dialog mobile network carrier in 2000. After a few years, another carrier, Hutch, was introduced in 2005 creating a competition for the demand among the homeowners. In 2006, a census was carried out, and it was found out that of the 600 homeowners who were initially subscribed to Dialog, 150 had been switched to Hutch due to network issues related to signal strength. Moreover, due to the popularity of mobile usage in the country, Hutch has been subscribed by additional 130 families whereas Dialog has successfully recruited the rest of the families according to the 2006 census reports.

In this village, will the two network carriers will be in continuous fight for the demand in the years to come or will a network monopoly be created?

## **Instructions:**

Present the discussion of the solution with proper justifications and assumptions to the above problem in a full report. Cite references where needed.