

Correction and some comments

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1 Correction

There are wrong equation in exercise page. Please refer following equations.

$$\begin{aligned} \text{Centripetal force of satellite movement} &= \text{Gravity between the earth and the satellite} \\ mr\omega^2 &= G\frac{Mm}{r^2} \end{aligned} \quad (1)$$

$$r = \sqrt[3]{\frac{GM}{\omega^2}} \quad (2)$$

$$h = r - R_e \quad (3)$$

m Mass of the satellite

M Mass of the earth

h Orbit altitude

G gravitational constant(= $6.6720 \times 10^{-11}[m^3/kg \cdot sec^2]$)

R_e Radius of the earth(= $6378[km]$)

r Radius of the satellite orbit

2 ATM and satellite

ATM mechanism was designed for telephone network. Because it was designed for telephone network, it doesn't have multicast or broadcast capability. The other hand, satellite has a nature of broadcasting. This is one of the reason which I don't think it is better to use ATM cell on the satellite link.

3 URLs and Keyword

<http://www.ietf.org>

<http://www.dvb.org>

<http://www.itu.int>

<http://www.hns.com> DirecPC and DirecWay

Keywords

DVB-RCS, TCPSAT, UDLR, VSAT, SATNET, PRNET, ARPANET