# Tanta University ENT Department

Time: 2 hours

29/4/2012

# Master Degree Audiology First Part (Acoustics)

## All questions must be answered:

#### 1-Give short account on:

- Relationship between sound pressure & distance.
- Diffraction and its relation to sound frequency.
- Adaptation and Fatigue.
- Transition point in threshold estimation.

# 2-Discuss the following:

- Duplex theory.
- Minimal audibility curve.
- **3- Define** force, velocity & momentum and mention the relation between them.

### 4-Put ( )or (x ) and explain why: □

- Two sounds of 10 <sup>-6</sup> w/m<sup>2</sup> intensity presented simultaneously will have an intensity level equal to 63 dB ( ).
- If a sound is increased from 1 to 2 KHz, the pitch is increased from 1 to 2 mels ( ).