1011-34-14 **Ronald M Mathsen***, 122 Treasure State Drive, Great Falls, MT 59404-3402. *Oscillation for odd-order neutral Δ-differential delay equations on a time scale.* Preliminary report.

On a time scale $\mathbb{T}$ we consider the neutral quasi-Δ-differential delay equation

$$L(x(t) - P(t)x(g(t))) + Q(t)x(h(t)) = 0 \tag{1}$$

where L is an odd-order-Δ quasi-differential operator. We assume that $\sup \mathbb{T} = \infty$ and that both $g(t)$ and $h(t) \to \infty$ as $t \to \infty$ and $g(t) < t$ for all large t. $P(t)$ and $Q(t)$ are both nonnegative. A solution x of this equation is a continuous function for which the Δ-derivatives in L exists and (1) is satisfied on some interval $[a, \infty)$. In this work we place interval conditions on the way g and h map $\mathbb{T}$ to $\mathbb{T}$ that allow us to establish sufficient conditions for oscillation of all solutions of (1) under various assumptions on P and Q. Examples for $T = \mathbb{R}$ and $T = \mathbb{Z}$ are given. (Received June 13, 2005)