MEDIA NOISE POST-PROCESSOR WITH VARYING THRESHOLD

ABSTRACT OF THE DISCLOSURE

A post-processing method and circuit (30) for correcting media noise errors and producing a corrected recovered data output signal (49) is disclosed for use in a sampled data read channel of a mass data storage device. The mass data storage device has a Viterbi detector (34) that receives actual sampled partial response target data (32) from a data medium of a mass data storage device. A recovered partial response target signal derived from said recovered data output signal and said sampled partial response target data is filtered to produce a filtered output signal (51). A threshold circuit (64) provides a threshold against which said filtered output signal is compared, and a predetermined value (60) is added to the filtered output signal when a predetermined error event pattern due to media noise or other transition jitter occurs in said recovered data output signal (35). The recovered data output signal is modified (70) when said filtered output signal exceeds the threshold of said threshold circuit (64).

FIGURE 4