

**DATA STORAGE DISK WITH INFORMATION ENCODED IN THE POSITION
ERROR SIGNAL FIELDS**

ABSTRACT

There is disclosed a disk for use in a disk drive and a method for making the disk. The position error signal (PES) fields (51,52,53,54,55) for each track on the disk are written with predetermined data, e.g. servo data, encoded thereon. In the preferred embodiment: a) the data such as the track number is mapped into codewords of an error correction code (ECC); b) bit-vectors are used to encode the symbols for further redundancy ; and c) the raw data written in the PES fields (51,52,53,54,55) is constrained to equalize the analog signal characteristic used by the servo system for positioning. Thus, the invention allows the PES fields (51,52,53,54,55) to be used as in the prior art while also being used as a source of digital data which is robustly recorded therein.

FIG.2B