

What is New at KMS?

We are now delivering the 32-bit sub-acquisition interface KMS-831, which gives the customer many benefits:

- Targeted at semi-permanent and permanent monitoring market
- Greater flexibility in combining seismic/electromagnetic acquisition
- Increases the number of channels at lower cost (25% of the 820 cost/channel)
- Builds digital networks at KMS-820 sites
- Network can be extended after initial installation
- Extends the acquisition to borehole and hard to reach terrain
- The 831 can connect to almost any sensor (32-bit design)
- Transitions from analogue to distributed digital acquisition.
- Mixed sampling rate acquisition
- Patented design (patent pending – issued mid 2015)



Customer product news:

To solve the problem of not being able to do simultaneous sampling for low and high frequencies in magnetotelluric application, KMS developed a 3-CH, 32-bit, low noise acquisition module for high resolution applications. This KMS-831 module connects to the existing KMS-820 MT station through digital cables. The acquisition timing is synchronized with the main station. In addition, KMS-831 can be cascaded to increase the number of channels. The standard cable length of each KMS-831 is 20 meters.

This innovative architecture makes KMS-831 unique in many applications:

- In magnetotelluric (or other frequency domain electromagnetic) applications, it enables simultaneous acquisition for shallow and deep layers of structure without changing the coils
- This architecture significantly reduces the acquisition cost per channel by cascading multiple **low cost** KMS-831 modules where monitoring a large area with many channels is required. Thus far we have delivered 3 and 6 channel versions.
- This unique architecture enables KMS-831 applications in borehole CSEM applications. This is helpful for real-time acquisition and monitoring where it is impossible for autonomous nodal stations.

In the figure below, multiple KMS-831s are connected in series by different cables in the same way as a traditional seismic tool string, to do EM and/or seismic

acquisition. The cable relays and amplifies the signal at each station so that communication can reach the KMS-820 on the surface for real-time monitoring of each individual KMS-831 module and Q/A processing. All the data are saved in the KMS-820 SD card.

Please visit our website for more detail: http://kmstechnologies.com/KMS_flyer_archive.html

