Subject: Fiter response - frequency domain and time domain
Posted by Wayne Parham on Mon, 27 Jun 2005 19:53:06 GMT
View Forum Message <> Reply to Message

Study up on filters, paying attention to amplitude response verses time response. You'll find information about the things mentioned in the excerpt you quoted. Basically, filters that are optimized for the time domain produce response anomalies and those optimized for the frequency domain produce phase anomalies.A digital filter is usually a software implementation of an analog filter. One could be written that didn't have an analog, but it would probably do something unnatural and be of little value. An example would be a digital filter that removed 10 samples every 10th of a second. Not very useful. What is usually implemented are digital implementations of standard analog filters.Digital processing also includes algorithms that massage the data in an attempt to get a better representation of the original analog signal. Upsampling is an algorithm that inserts interpolated data points in between two sampled ones. This kind of digital processing is a lot like using smoothing and anti-aliasing filters in digital video processors.
Digital Filters