Advantages of Progressive Conversion

Line doublers are used in other high-end home entertainment systems to provide progressive scanning. These may be stand-alone devices or incorporated into a digital TV. Impressive as they may be, our progressive scan DVD players' in-player progressive conversion has three big advantages over line doublers:

1) High precision and stability
   A DVD-Video disc mastered from a film holds all the data necessary to produce an accurate progressive image, whereas an external line doubler must take hints from the video source to determine the source material and frame allocation.

2) All-digital conversion minimizes signal degradation
   Since the signal from the DVD-Video disc is digital, progressive conversion can be performed digitally inside the player. Signal quality is protected until it leaves the player's analog output. In contrast, a stand-alone or in-TV doubler first receives information from the analog output of the source device then converts this analog signal back to digital for processing. Finally, it must translate the signal back to analog before outputting it. All this back-and-forth translation is much more likely to degrade the signal.

3) Processing is optimized to DVD-Video's high image quality
   Line doublers built into digital TV sets are designed to work with a variety of video sources, so their settings are not necessarily ideal for DVD-Video. The progressive conversion of our progressive scan DVD players is optimized for the high resolution and low noise of the DVD-Video format. This enables the unit to preserve DVD-Video picture quality for display on all screen sizes, from direct-view CRT to projectors.