

Digital Video Recorder (DVR)

Complete systems for image acquisition

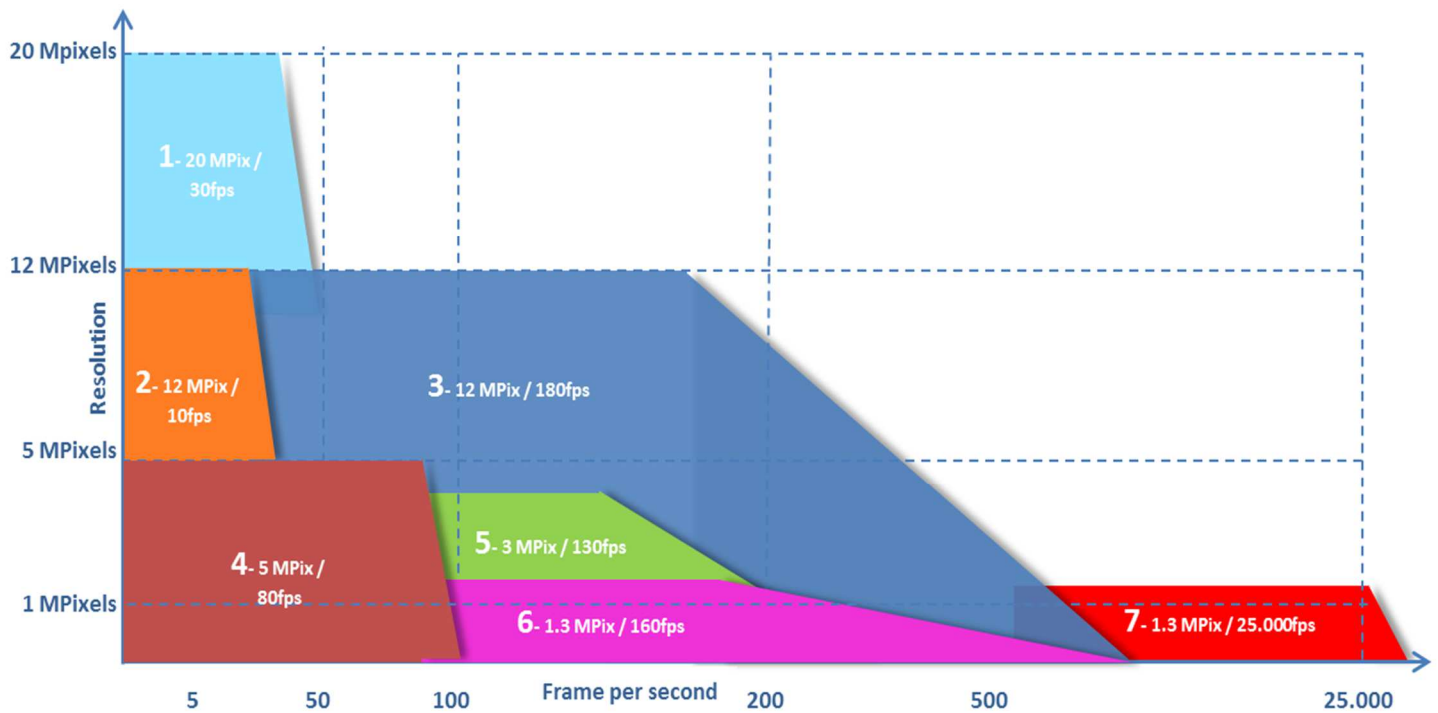
including camera, acquisition station, and image acquisition software



7 DIFFERENT PACKAGES ARE AVAILABLE TO SATISFY A WILD RANGE OF APPLICATIONS LIKE:

High speed imaging
Microscopy
Fluorescence
Tracking

Particle Image Velocimetry
Metrology
Microfluidic
 ...



DVR systems of R&D Vision are compatible with all main cameras manufacturers to work from UV to IR with high or low resolution and at frame rates from 5fps to more than 20.000fps in full resolution.

Features

Cameras

- Monochrome or color
- High resolution: up to 25 Mpixels
- High frame rate: up to 1.000.000 fps



Recording Station

- RAM or Direct to Disk for long recording time
- Compatibility: USB 3, CameraLink, HD - SDI, GE, CoaXPress, Firewire, ...

Acquisition software HIRIS

- Multi-cameras
- Pre-Post Trigger mode
- Raw data acquisition or real-time compression



Options

Recording Station

- Laptop station
- Fanless station for embedded applications
- DAQ frame grabber
- Delay generator for synchronization



Software

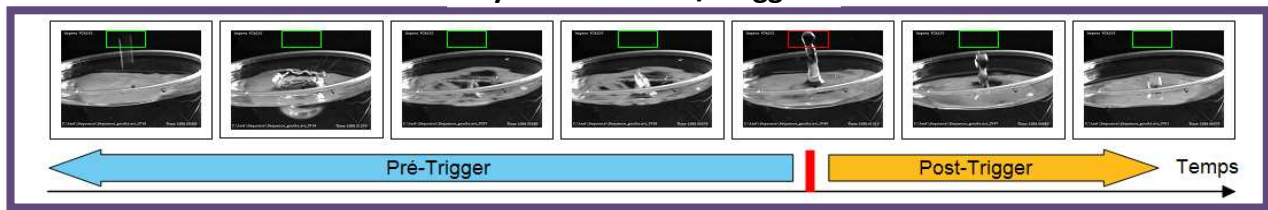
- IO Tool : Data Acquisition – GPS, analog signals,...
- Image Processing Module: tracking, PIV, ...

Accessories

- lighting systems
- fixing systems
- lenses
- synchronization device
- ...



Synchronization / Trigger



RECORDING STATION

CONFIGURATION	RAM	Direct to Disk
Capacity	From 8GB to 128 GB Several seconds to a few minutes	From 1TB to 16TB Several minutes to a few hours
Maximum bandwidth for acquisitions of raw data	2.6GB/s	1.8GB/s
Options	<ul style="list-style-type: none"> - Specific architecture for embedded applications - Data Acquisition of analog or digital signals <ul style="list-style-type: none"> - Electronic for synchronization <ul style="list-style-type: none"> - IRIG datation - Specific graphic card for GPU calculation 	

SOFTWARE

HIRIS, Acquisition	Image Processing Module (Option)	IO Tool (Option)
Single or multi cameras acquisition (USB 3, GE, CameraLink, CoaXPress, HD-SDI ...)	Arithmetic functions on the images	Events synchronization (TTL, analog, ...)
Mode Single or Pre-Post trigger	Spatial and morphological filtering	Digitizing of analog signals
Trigger of acquisitions by software, hardware or automatic by image analysis	Advanced thresholding functions	Management of hardware and software I/O
Histogram, rotations, spatial calibration 2D and 3D	Advanced algorithms (particles detection, counting, PIV, ...)	Programmable clock
Dynamic LUT, overlays	Real time processing or post processing	Compatible with National Instruments DAQ frame grabber

