

## **HistoDigital (HiD)**

# What if you could...









#### **Digital Workflow**

- » Assisted Sorting and Alignment
- » Correction of Staining Variances
- » Rigid and Non-Rigid Slice Alignment
- » 3-D Volumetric Reconstruction

#### **Applications**

- » Assess Tissue from all Sides
- » Exempt Anatomical Structures
- » Visualize Topographical Situation
- 3-D Tissue Analysis
- » Digital Pathology

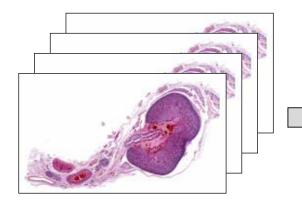
**More Info** 



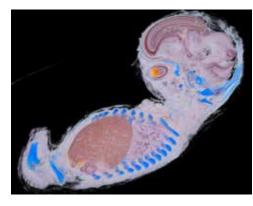
## HistoDigital (HiD)

**HistoDigital (HiD)**<sup>1</sup> is an application that enables you to create a digital 3-D reconstruction of the anatomical tissue structures from the datasets of your histological slide images.

In the spatial reconstruction of your data with **HiD**, we attach particular importance to the anatomically accurate reconstruction of the original tissues through the iterative application of special algorithms in order to enable a powerful analysis and interpretation of the structures.

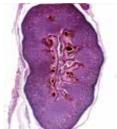


Histological slides from from a fetal kidney dataset

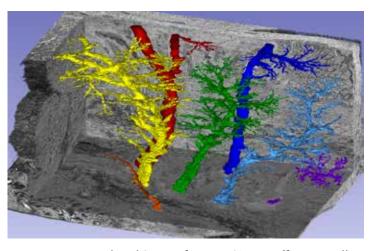


3-D volume rendering of a reconstructed fetus stack.





Multiplanar reformatted views perpendicular to the slide plane after 3-D volumetric reconstruction.



Left: Reconstruction of a paraffin embedded pig lacrimal gland (grey) along with a segmentation of seven excretory lacrimal ducts (different colors)<sup>2</sup>.

## Assess digitally reconstructed tissue from all sides

It is important for you to exempt anatomical structures (segmentation), to understand the position and course of these structures within the tissue or to analyse the topographical situation in

a certain area in detail (zoom function)? HiD offers you all possibilities for three-dimensional tissue diagnosis!

The user interface gives you quick and clear access to all functionalities of the program. Once you have decided on a display option for your image data, you are only a few mouse clicks away from a successful and qualitatively unrivaled 3-D reconstruction.

- <sup>1</sup> HistoDigital HiD is currently not a certified medical software. Its intended use is for research purposes.
- <sup>2</sup> Henker, Robert; Scholz, Michael; Gaffling, Simone; Asano, Nagayoshi; Hampel, Ulrike; Garreis, Fabian; Hornegger, Joachim; Paulsen, Friedrich. "Morphological Features of the Porcine Lacrimal Gland and Its Compatibility for Human Lacrimal Gland Xenografting", PLoS one, vol. 8, no. 9, pp. e74046, 2013



