

Release Notes

ZEISS ZEN 3.6 (blue edition)



ZEISS ZEN 3.6 (blue edition)

Original Manual

Carl Zeiss Microscopy GmbH
Carl-Zeiss-Promenade 10
07745 Jena
Germany
microscopy@zeiss.com
www.zeiss.com/microscopy



Carl Zeiss Microscopy GmbH
ZEISS Group
Kistlerhofstr. 75
81379 München

Document Name: ZEISS ZEN 3.6 (blue edition) - Release Notes
Revision: 1
Language: en-US
Effective from: 05/2022

© 2022 Without the prior written consent of ZEISS, this document or any part of it must neither be translated nor reproduced or transmitted in any form or by any means - including electronic or mechanic methods, by photocopying, recording or by any information or filing system. The right to make backup-copies for archiving purposes shall remain unaffected thereby. Any violations may be prosecuted as copyright infringements.

The use of general descriptive names, registered names, trademarks, etc. in this document does not imply that such names are exempt from the relevant intellectual property laws and regulations and therefore free for general use. This shall also apply if this is not specifically referred to. Software programs shall entirely remain the property of ZEISS. No program or subsequent upgrade thereof may be disclosed to any third party, copied or reproduced in any other form without the prior written consent of ZEISS, even if these copies or reproductions are destined for internal use at the customer's only, the only exception being one single back-up copy for archiving purposes.

1 ZEN 3.6

New Product Structure

ZEN 3.6 introduces a new product structure. Many functions and modules are now grouped into distinct software toolkits and packages.

New Functionality

The following new software functionality is available:

Package/Toolkit	Description
AI Toolkit - Intellesis Denoising	<p>A deep-learning based method to learn "the noise" from the image itself (no labels or ground truth need) in order to remove the noise.</p> <ul style="list-style-type: none"> User-friendly tool to train a deep learning based model without the need to provide any annotations. Trained models can be applied to denoise images. Supports any image data format in ZEN including multidimensional data sets such as Z-stack, multi-channel and tile images can be processed.

New Features & Improvements

Package/Toolkit	Features/Improvements
Connect Toolkit	<p>ZEN connect is supported by a manual 3D alignment.</p> <ul style="list-style-type: none"> Display of two volumes from all three angles and in 3D. Shifting the selected volume and changing opacity and LUT. Alignment with the help of a dedicated alignment tab.
Direct Processing	<ul style="list-style-type: none"> Setup optimized for using only one workstation. New functions available: Linear Unmixing and EDF (extended depth of focus). Individual default functions for each system determined based on your MTB configuration. Speed test: significant increase when using Direct Processing for acquisition.
2D Toolkit and Bio Apps	<ul style="list-style-type: none"> Image Analysis and Bio Apps are now AI-ready. The execution of a machine learning model in the image analysis does not require an Intellesis licence any more. Creating "Custom Features" in image analysis, e.g. translocation ratio.
FCS	<p>Improvements for FCS functionality for LSM 980:</p> <ul style="list-style-type: none"> Displaying all relevant metadata in the Info view tab, including beam path settings, measurement settings and analysis settings. Enabling the reuse function for FCS documents which sets all hardware parameters (including measurement settings for the experiment) and includes the Fit model used during acquisition. Providing optimized pinhole settings for cross correlation experiments.

Carl Zeiss Microscopy GmbH
Carl-Zeiss-Promenade 10
07745 Jena
Germany

phone: +49 3641 64 3161
fax: +49 3641 64 3439
info.microscopy@zeiss.com
www.zeiss.com/microscopy