

## KIMBA 2 Requirements

ID	Title	Module\Submodule	Description	Testing types	Testing objects for cheking	Test case ID, Check list ID
1	Operating System	OS Windows	Application for Windows XP and Windows Vista with Installer	Installation testing, Crossplatform testing	Install, uninstall, reinstall, etc.	Check list Installation
1.1	Operating System	Windows XP		Documentation testing	Requirements, Readme, Help etc. files	Check list Installation Documentation
1.2	Operating System	Windows Vista		File system testing	Installer, program folder, output/input folder, registry, task manager, program lable, etc.	Check list Installation Check program folder  Icon
2.1	Summary/ Functionality	File Conwertation, Optimization	Application to convert and optimize Digicam pictures for presentation on a community website.	Functional testing, equivalence class and boundary values testing	Input/output file types, min/max sizes	TC 1, TC 4, TC 5
2.2	Summary/ Functionality	Folder, Main Window	Preview of pictures in a folder as thumbnails. Thumbnails from folder shown in Main Window	Functional testing	Pictures preview	TC 1, TC 2, TC 3
2.3	Summary/ Functionality	Folder, Main Window	Multiple pictures can be selected	Functional testing	Multiple pictures selection	TC 6
2.4	Summary/ Functionality	Main Window toolbar "Delete"	Multiple pictures can be deleted	Functional testing	Multiple pictures deletion	TC 24, TC 25, TC 26, TC 27, TC 28, TC 29
2.5	Summary/ Functionality	Main Window toolbars "Rotate right", "Rotate left"	Multiple pictures can be rotated	Functional testing	Multiple pictures roration	TC 20
2.6	Summary/ Functionality	Main Window, toolbar "Optimize"	Multiple pictures can be optimized (e.g. brightness, sharpness)	Functional testing	Multiple pictures optimization	TC 22
2.7	Summary/ Functionality	Conversion, compression	Conversion and compression of pictures in a batch process: small version, big version, thumbnail.	Functional testing	Batch proces of conversion and compression	TC 4
2.8	Summary/ Functionality	Conversion, compression	In the big version of the pictures the community logo is placed at the right top (watermark).	Functional testing, GUI	Watermark in the big version of the pictures	TC 8
2.9	Summary/ Functionality	Compression	All pictures in the folder will then be compressed in a zip-file for uploading to community's webserver.	Functional testing	Zip-files in program folder	TC 6
2.10	Summary/Design	Name	The Application is called Kimba Version 2.0.	GUI	Application name at desktop, folders, documentation	Check list Installation  Name
2.11	Summary /Localisation	Language /Localization	The application is for a german audience. Offer a language file for different languages. English language has to be provided.	GUI Localization Internationalization	Text and GUI	Check list Main window (system) I10N L18N
3.1	Main Window and Menus	Main Window	Main window (schema) Menuitems and toolbar Thumbnails from folder shown Thumbnails selectable (single or many), kontext menu (right click) Doubleclick on a thumb: open optimize window Window buttons	GUI Functional testing Usability	Location and presence of elements, Contextmenu, optimize window, minimize and closing the window	Check list Main window (system) GUI

3.1.1	Right Click on picture or selected pictures (Contextmenu)	Context menu	Show Edit-menu	GUI Functional testing	Contextmenu	TC 30
3.1.2	File	Main Window/ File menu				
3.1.2.1	Folder	File menu / Folder	Open Folder (Explorer-Tree) to select working-directory with pictures from Digicam. If a folder is selected, then show all pictures in that folder as thumbnails in main window.	Functional testing	Explorer-Tree navigation, file selection, displaying of pictures as thumbnails	TC 1
3.1.2.2	Create Gallery	File menu / Create Gallery	Starts a batch process to convert and archive all pictures in current folder into a ZIP-file. A target file has to be selected (default: CURRENT_DIRECTORY/kimba.zip) The following steps have to be done by the batch process.	Functional testing	Batch proces of conversion and compression into a ZIP-file, target file selection	TC 4
3.1.2.2a	Create Gallery	File menu / Create Gallery	It has to be checked, that a cover-pic is selected. This cover picture is then converted and stored separately as index.jpg	Functional testing Decision Table Testing	Cover-pic selection, conversation and saving	TC 5
3.1.2.2b	Create Gallery	File menu / Create Gallery	All files have to be compressed and optimized for use in web (max Filesize for big pictures: 100 kb). Optional checkbox: Auto-optimize all pictures => Menü Edit?	Functional testing Decision Table Testing  Boundary values testing	Size of output files, checkbox autooptimization	TC 6, TC 9
3.1.2.2c	Create Gallery	File menu / Create Gallery	All Files have to be converted to 2 different sizes. See Dimensions below. Dimensions: <ul style="list-style-type: none"> <li>Cover-Picture: 130 x 120 px</li> <li>Thumb: 170 x 127,5 px (4:3)</li> <li>Big: 640 x ? px (4:3, e.g. 640 x 480 px – depends on horizontal or vertical format of picture)</li> </ul> + Add Logo Logo (external png-file in program directory) is added to big-version of the pictures located right top	Functional testing equivalence class and boundary values testing Decision Table Testing Pairwise testing	File convertation, placing the watermark, external logo file	TC 7, TC 8
3.1.2.2d	Create Gallery	File menu / Create Gallery	Then all files are archived into the ZIP file according to the structure described below. Destination of converted pictures in ZIP File <ul style="list-style-type: none"> <li>Cover: index.jpg</li> <li>Thumbs: ./small/</li> <li>Big: ./big/</li> </ul> The filenames of the pictures in the Archive have to be websafe and lowercase. Proposal: [incremental_no].jpg	Functional testing equivalence class and boundary values testing Decision Table Testing Pairwise testing	Ziping files according to the size, filenames	TC 7
3.1.2.3 Exit	3.1.2.3 Exit	File menu/ Exit	Close application	Functional	Closing the app by different ways, saving the changes	Check list File Exit
3.1.3	Edit	Main Window/ Edit menu				

3.1.3.1	Delete	Edit menu / Delete	Deletes selected pictures (single or many).	Functionaal	Deletion of pictures, confirmation	TC 22, TC 27, TC 28, TC 29
3.1.3.2	Rotate left	Edit menu/ Rotate left Main Window/ Rotate left toolbar	Rotates selected pictures 90° left	Functionaal	Rotation left, saving the changes	TC 44, TC 45, TC 46
3.1.3.3	Rotate right	Edit menu/ Rotate right Main Window/ Rotate right toolbar	Rotates selected pictures 90° right	Functionaal	Rotation right, saving the changes	TC 47, TC 48, TC 49
3.1.3.4	Flip horizontal	Edit menu/Flip horizontal	Rotates selected pictures 180° (flip)	Functionaal	Rotation 180° (flip), saving the changes	TC 50, TC 51, TC 52
3.1.3.5	Optimize	Edit menu/Optimize Optimize toolbar	Opens optimize window	Functionaal GUI	Optimize window	TC 20
3.1.3.5a	Optimize	Optimize / Show Picture	Show Picture (big, suitable to window) with filename	Functionaal GUI	Show Picture window	TC 21
3.1.3.5b	Optimize	Optimize / Show EXIF-Data	Show EXIF-Data (if available)	Functionaal GUI	Show EXIF-Data	Check list Optimize Window EXIF-Data
3.1.3.5c	Optimize	Optimize / Rotate left /right, flip buttons	Rotates selected pictures 90° left Rotates selected pictures 90° right Rotates selected pictures flip	Functionaal	Rotation right/left /right, flip	TC 44-53
3.1.3.5d	Optimize	Optimize / Auto-optimize	Auto-optimize: enhance colors, sharpen, brightness/contrast (IMPORTANT!)	Functionaal GUI	Enhancing colors, sharpen, brightness /contrast	TC 55-57
3.1.3.5e	Optimize	Optimize / Slider: sharpness	Enhance sharpness	Functionaal GUI	Enhancing sharpness	TC 58-59
3.1.3.5f	Optimize	Optimize / Slider: brightness	Enhance brightness	Functionaal GUI	Enhancing brightness	TC 60-61
3.1.3.5g	Optimize	Optimize / Slider: contrast	Enhance contrast	Functionaal GUI	Enhancing contrast	TC 62-63
3.1.3.5h	Optimize	Optimize / Red-Eye-Reduction	Red-Eye-Reduction: Select area in picture and optimize	Functionaal GUI	Red-Eye selection and optimization	TC 53-54
3.1.3.5i	Optimize	Optimize / Apply /Cancel	Applying, canceling optimization	Functionaal	Applying, canceling changes	Check list Optimize Window Button "Apply to all"
3.1.3.5j	Optimize	Edit menu/Optimize	If more than one picture selected show first of selection and offer button "Apply to all (x Pictures)"	Functionaal	Applying to all pictures	Check list Optimize Window Button "Apply to all"
3.1.3.6	Select as cover (checked /unchecked)	Edit menu/Select as cover	Selects current picture as cover picture for gallery. Picture is visually marked with a border. Can be unselected as coverpic.	Functionaal	Picture selection /unselection, visual marking	TC 70-71
3.1.3.7	Order by random	Edit menu/ Order by random	All Pictures are reordered randomly	Functionaal	File order	TC 69
3.1.4	Options	Main Window/ Options menu	Opens options window	Functionaal GUI	Options window	TC 30
3.1.4a	Options	Options/Language	Language: English/German	Functionaal GUI Localization	Text, GUI	TC 10-13
3.1.4b	Options	Options/Thumbnail-size	Thumbnail-size: width x height px	Functionaal GUI	Changing Thumbnail-size	Check list Options window

3.1.4c	Options	Options/Bigpic-size	Bigpic-size: width x height px	Functionanal GUI	Changing Bigpic-size	Check list Options window
3.1.4d	Options	Options/Coverpic-size	Coverpic-size: width x height px	Functionanal GUI	Changing Coverpic-size	Check list Options window
3.1.4e	Options	Options/Path KWICK!-Logo: <path>	Path KWICK!-Logo: <path>	Functionanal GUI	Applying path to logo file	TC 13-19
3.1.4f	Options	Options/ Apply /Cancel	Apply/Cancel options	Functionanal GUI	Applying, canceling changes	Check list Options window
3.1.5 Help	Help	Main Window/ Help	Open HTML-Dokument at our webserver (e.g. <a href="http://intra.kwick.de/kimba.html">http://intra.kwick.de/kimba.html</a> )	Functionanal GUI Useability	Path to HTML-Dokument	TC 72