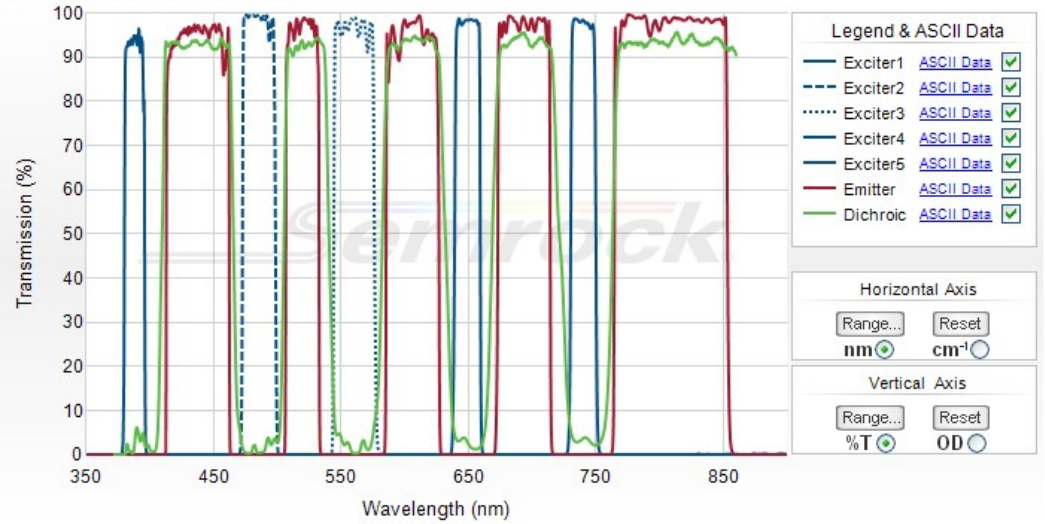
**BrightLine® Pinkel filter set, optimized for DAPI, FITC, TRITC, Cy5 & Cy7 and other like fluorophores**
**Part Number: DA/FI/TR/Cy5/Cy7-5X-A-000**





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**BrightLine® Pinkel filter set, optimized for DAPI, FITC, TRITC, Cy5 & Cy7 and other like fluorophores**

This 7-filter "Pinkel" penta-band set is designed for high-speed, sequential imaging of DAPI, FITC, TRITC, Cy5, and Cy7 (and other key fluorophores – see complete list above). The complete set is comprised of a penta-band beamsplitter and emission filter and five single-band exciters – all "no burn-out". The single-band filters are intended to be mounted in filter wheels.

**Individual filters and filter sets (no cube):**

These filters sets contain individual filters. For filter sets already mounted in a holder/cube, scroll down to see complete mounted sets with cubes.

| Part Number | Price[1] | Stock Status |
|---|---|---|
| DA/FI/TR/Cy5/Cy7-5X-A-000 (Standard size set, fits most microscopes) | $2,385 | Contact Us |

| Filter Role | Filter Size | Part Number | Price[1] |
|---|---|---|---|
| Single Band Exciter | 25 mm x 5.0 mm | FF01-387/11-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF02-485/20-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-560/25-25 | $355 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-650/13-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-740/13-25 | $405 |
| Penta Band Emitter | 25 mm x 3.5 mm | FF01-440/521/607/694/809-25 | $575 |
| Penta Band Dichroic | 25.2 mm x 35.6 mm x 1.1 mm | FF408/504/581/667/762-Di01-25x36 | $605 |

DA/FI/TR/Cy5/Cy7-5X-A-L01 (Leica 'Large' set) $2,385 Contact Us

| Filter Role | Filter Size | Part Number | Price[1] |
|---|---|---|---|
| Single Band Exciter | 25 mm x 5.0 mm | FF01-387/11-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF02-485/20-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-560/25-25 | $355 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-650/13-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-740/13-25 | $405 |
| Penta Band Emitter | 25 mm x 3.5 mm | FF01-440/521/607/694/809-25 | $575 |
| Penta Band Dichroic | 22.0 mm x 29.0 mm x 1.1 mm | FF408/504/581/667/762-Di01-22x29 | $605 |

DA/FI/TR/Cy5/Cy7-5X-A-L02 (Leica 'Small' set) $2,629 Contact Us

| Filter Role | Filter Size | Part Number | Price[1] |
|---|---|---|---|
| Single Band Exciter | 25 mm x 5.0 mm | FF01-387/11-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF02-485/20-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-560/25-25 | $355 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-650/13-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-740/13-25 | $405 |
| Penta Band Emitter | 25 mm x 3.5 mm | FF01-440/521/607/694/809-25 | $575 |

$2,485 Contact Us

| Filter Role | Filter Size | Part Number | Price[1] |
|---|---|---|---|
| Single Band Exciter | 25 mm threaded ring for Sutter Lambda filter wheel | FF01-387/11-25-STR | $325 |
| Single Band Exciter | 25 mm threaded ring for Sutter Lambda filter wheel | FF02-485/20-25-STR | $325 |
| Single Band Exciter | 25 mm threaded ring for Sutter Lambda filter wheel | FF01-560/25-25-STR | $375 |
| Single Band Exciter | 25 mm threaded ring for Sutter Lambda filter wheel | FF01-650/13-25-STR | $325 |
| Single Band Exciter | 25 mm threaded ring for Sutter Lambda filter wheel | FF01-740/13-25-STR | $425 |
| Penta Band Emitter | 25 mm x 3.5 mm | FF01-440/521/607/694/809-25 | $575 |
| Penta Band Dichroic | 25.2 mm x 35.6 mm x 1.1 mm | FF408/504/581/667/762-Di01-25x36 | $605 |

1) US domestic pricing only. If you are ordering from outside the US, please contact your nearest regional distributor for the correct list price.

**Complete filter sets mounted in microscope holders/cubes:**

These sets are delivered already mounted in microscope filter holders, often called 'cubes', ready to be dropped into your microscope.

**Nikon Quadfluor** for microscopes: E200, E400, E600, E800, E1000, TS100, TS100F, TE200, TE300, ME600L, L150A, and some Labophot, Optiphot, and Diaphot series

DA/FI/TR/Cy5/Cy7-5X-A-NQF (set mounted in cube) $2,780 Contact Us

| Filter Role | Filter Size | Part Number | Price[1] |
|---|---|---|---|
| Single Band Exciter | 25 mm x 5.0 mm | FF01-387/11-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF02-485/20-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-560/25-25 | $355 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-650/13-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-740/13-25 | $405 |
| Penta Band Emitter | 25 mm x 3.5 mm | FF01-440/521/607/694/809-25 | $575 |
| Penta Band Dichroic | 25.2 mm x 35.6 mm x 1.1 mm | FF408/504/581/667/762-Di01-25x36 | $605 |
| Quadfluor cube | | NQF | $395 |

**Nikon TE 2000** for microscopes: TE 2000, 50i, 55i, 80i, 90i, Eclipse Ti, Ni, and Ci series, and any using the Epi-fluor Illuminator

DA/FI/TR/Cy5/Cy7-5X-A-NTE (set mounted in cube) $2,780 Contact Us

| Filter Role | Filter Size | Part Number | Price[1] |
|---|---|---|---|
| Single Band Exciter | 25 mm x 5.0 mm | FF01-387/11-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF02-485/20-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-560/25-25 | $355 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-650/13-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-740/13-25 | $405 |
| Penta Band Emitter | 25 mm x 3.5 mm | FF01-440/521/607/694/809-25 | $575 |
| Penta Band Dichroic | 25.2 mm x 35.6 mm x 1.1 mm | FF408/504/581/667/762-Di01-25x36 | $605 |
| TE 2000 cube | | NTE | $395 |

**Olympus U-MF2** for microscopes: AX70, BX, BX41, BX50, BX51, BX60, BX61, BX50/51WI, BX60/61WI, IX50, IX51, IX70, IX71, IX81

DA/FI/TR/Cy5/Cy7-5X-A-OMF (set mounted in cube) $2,820 Contact Us

| Filter Role | Filter Size | Part Number | Price[1] |
|---|---|---|---|
| Single Band Exciter | 25 mm x 5.0 mm | FF01-387/11-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF02-485/20-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-560/25-25 | $355 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-650/13-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-740/13-25 | $405 |
| Penta Band Emitter | 25 mm x 3.5 mm | FF01-440/521/607/694/809-25 | $575 |
| Penta Band Dichroic | 25.2 mm x 35.6 mm x 1.1 mm | FF408/504/581/667/762-Di01-25x36 | $605 |
| U-MF2 cube | | OMF | $435 |

**Olympus U-FF** for microscopes: BX53, BX63

DA/FI/TR/Cy5/Cy7-5X-A-OFF (set mounted in cube) $2,820 Contact Us

| Filter Role | Filter Size | Part Number | Price[1] |
|---|---|---|---|
| Single Band Exciter | 25 mm x 5.0 mm | FF01-387/11-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF02-485/20-25 | $305 |

| | | | |
|---|---|---|---|
| Single Band Exciter | 25 mm x 5.0 mm | FF01-560/25-25 | $355 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-650/13-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-740/13-25 | $405 |
| Penta Band Emitter | 25 mm x 3.5 mm | FF01-440/521/607/694/809-25 | $575 |
| Penta Band Dichroic | 25.2 mm x 35.6 mm x 1.1 mm | FF408/504/581/667/762-Di01-25x36 | $605 |
| U-FF cube | | OFF | $435 |

**Zeiss FL Cube EC P+C** for microscopes: Axio Imager, Axiostar Plus, Axioskop 40, Axioskop 2 (post-2001), Axioplan 2i, Axioplan 2ie, Axiovert 200, Axiovert 40, Axio Observer, Axio Examiner and Axio Scope A1

DA/FI/TR/Cy5/Cy7-5X-A-ZHE (set mounted in cube) $2,660 Contact Us

| Filter Role | Filter Size | Part Number | Price[1] |
|---|---|---|---|
| Single Band Exciter | 25 mm x 5.0 mm | FF01-387/11-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF02-485/20-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-560/25-25 | $355 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-650/13-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-740/13-25 | $405 |
| Penta Band Emitter | 25 mm x 3.5 mm | FF01-440/521/607/694/809-25 | $575 |
| Penta Band Dichroic | 25.2 mm x 35.6 mm x 1.1 mm | FF408/504/581/667/762-Di01-25x36 | $605 |
| FL Cube EC P+C cube | | ZHE | $275 |

**Leica DM-K** for microscopes: DM-2000, DM-2500, DM-3000, DMI3000 B, DM-4000, DMI4000 B, DM-5000, DM-5500, and DM-6000, DMI6000 B

DA/FI/TR/Cy5/Cy7-5X-A-LDMK (set mounted in cube) $2,735 Contact Us

| Filter Role | Filter Size | Part Number | Price[1] |
|---|---|---|---|
| Single Band Exciter | 25 mm x 5.0 mm | FF01-387/11-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF02-485/20-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-560/25-25 | $355 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-650/13-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-740/13-25 | $405 |
| Penta Band Emitter | 25 mm x 3.5 mm | FF01-440/521/607/694/809-25 | $575 |
| Penta Band Dichroic | 22.0 mm x 29.0 mm x 1.1 mm | FF408/504/581/667/762-Di01-22x29 | $605 |
| DM-K cube | | LDMK | $350 |

**Leica DMi8 (P-Cube)** for microscopes: DMi8

DA/FI/TR/Cy5/Cy7-5X-A-LDMP (set mounted in cube) $2,820 Contact Us

| Filter Role | Filter Size | Part Number | Price[1] |
|---|---|---|---|
| Single Band Exciter | 25 mm x 5.0 mm | FF01-387/11-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF02-485/20-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-560/25-25 | $355 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-650/13-25 | $305 |
| Single Band Exciter | 25 mm x 5.0 mm | FF01-740/13-25 | $405 |
| Penta Band Emitter | 25 mm x 3.5 mm | FF01-440/521/607/694/809-25 | $575 |
| Penta Band Dichroic | 25.2 mm x 35.6 mm x 1.1 mm | FF408/504/581/667/762-Di01-25x36 | $605 |
| DMi8 (P-Cube) cube | | LDMP | $435 |

1) US domestic pricing only. If you are ordering from outside the US, please contact your nearest regional distributor for the correct list price.

### Optical Specifications

| Specification | Value |
|---|---|
| Blocking | BrightLine filters have blocking far exceeding OD 6 as needed to ensure a black background, even when using modern low-noise CCD cameras. The blocking is optimized for microscopy applications using our exclusive SpecMaker™ fluorescence filter design. |

### General Filter Specifications

| Specification | Value |
|---|---|
| Microscope Compatibility | BrightLine filters are available to fit Leica, Nikon, Olympus, Zeiss, and Aperio microscopes. |
| Optical Damage Rating | Testing has proven to show no signs of degradation when exposed to at least 6.0 W of power from an unfiltered xenon arc lamp over a 25 mm diameter (corresponding to 1.2 W/cm$^2$) for over 500 hours. |

### Physical Filter Specifications

| Specification | Value |
|---|---|
| Scratch-Dig | 60-40 |
| Exciter/Emitter Orientation | Arrow on ring indicates preferred direction of propagation of light. |
| Dichroic Orientation | "Reflective coating side" should face toward light source and sample. |

### Fluorophore Compatibility

★★★★ indicates this filter set was specifically optimized for this fluorophore.

★★★ indicates an excellent spectral match between fluorophore and filter set that should result in nearly ideal performance in most situations.

★★ indicates a good match between fluorophore and filter set, with actual performance dependent on other experimental conditions.

**Blue**

| Fluorophore | Compatibility |
|---|---|
| 1,8-ANS | ★★ |
| 4-methylumbelliferone | ★★ |
| 7-hydroxy-4-methylcoumarin | ★★ |
| Alexa Fluor® 405 | ★★ |
| AMCA (Aminomethylcoumarin) | ★★ |
| BD Horizon V450 | ★★★ |
| **BFP (EBFP)** | ★★★★ |
| Calcofluor White | ★★ |
| Cascade Blue™ | ★★ |
| CellTrace calcein violet | ★★★ |
| **DAPI** | ★★★★ |
| DiFMU-pH 9.0 | ★★ |
| DyLight 405 | ★★★ |
| HiLyte Fluor™ 405 | ★★ |
| LIVE-DEAD Fixable Violet Dead Cell Stain | ★★★ |
| LysoSensor Blue | ★★★ |
| LysoTracker Blue | ★★ |
| Marina Blue | ★★ |
| Pacific Blue™ | ★★★ |
| sgBFP™ | ★★★ |
| Sirius | ★★ |
| SpectrumBlue | ★★ |
| TagBFP | ★★ |
| Vybrant DyeCycle Violet | ★★ |

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**Green**

| Fluorophore | Compatibility |
|---|---|
| 5-carboxy-2,7-dichlorofluorescein | ★★ |
| 5-FAM (5-carboxyfluorescein) | ★★★ |
| Acridine Orange (+DNA) | ★★ |
| Alexa Fluor® 488 | ★★★ |
| Alexa Fluor® 500 | ★★ |
| AmCyan1 | ★★ |
| ATTO 488 | ★★★ |
| ATTO 495 | ★★★ |
| BCECF (pH 5.5) | ★★★ |
| BCECF (pH 9.0) | ★★★ |
| BODIPY FL | ★★ |
| BODIPY FL-MeOH | ★★ |
| Calcein | ★★★ |
| Calcium Green-1 | ★★ |
| CFP2 | ★★★ |
| Cy2™ | ★★ |

| | |
|---|---|
| CyQUANT GR-DNA | ★★ |
| DAF-FM-NO | ★★★ |
| Dendra2 (Green) | ★★★ |
| DiO | ★★★ |
| Dronpa | ★★ |
| DY-505-Phalloidin | ★★ |
| ecliptic pHluorin pH5.5 | ★★★ |
| Emerald | ★★★ |
| **FITC (Fluorescein)** | ★★★★ |
| FlAsH-CCPFCC | ★★ |
| Fluo-3 | ★★ |
| Fluo-4 | ★★★ |
| Fluorescein dextran | ★★★ |
| Fluorescein-pH 8.0 | ★★★ |
| Fluoro-Emerald | ★★★ |
| FluoSpheres Yellow-Green fluorescent microspheres | ★★ |
| **GFP (EGFP)** | ★★★★ |
| Green 496 | ★★★ |
| Green 500 | ★★★ |
| HCS LipidTOX Green neutral lipid stain | ★★★ |
| HCS LipidTOX Green phospholipidosis | ★★ |
| HiLyte Fluor™ 488 | ★★★ |
| LIVE-DEAD Fixable Green Dead Cell Stain | ★★★ |
| LysoSensor Green | ★★ |
| LysoTracker Green | ★★★ |
| LysoTracker Yellow HCK-123 | ★★ |
| Magnesium Green | ★★ |
| mHoneyDew | ★★ |
| MitoTracker™ Green | ★★★ |
| mWasabi | ★★★ |
| NBD-X (MeOH) | ★★ |
| NeuroTrace 500/525 Green Fluorescent Nissl Stain | ★★★ |
| Oregon Green™ 488 | ★★★ |
| Oregon Green™ 514 | ★★ |
| PicoGreen | ★★ |
| PKH67 | ★★ |
| Qdot® 525 Nanocrystals | ★★ |
| ratiometric pHluorin pH5 | ★★★ |
| Rhodamine 110 | ★★★ |
| Rhodamine 123 | ★★ |
| Rhodamine Green | ★★★ |
| Rhodol Green | ★★★ |
| sgGFP™ (super glow GFP) | ★★★ |
| Sodium Green | ★★ |
| SpectrumGreen | ★★★ |
| SYBR Gold nucleic acid gel stain-DNA | ★★★ |
| SYBR Green I nucleic acid gel stain-DNA | ★★★ |
| SYBR Safe DNA gel stain-DNA | ★★ |
| SYTO 11 | ★★ |
| SYTO 13 | ★★★ |
| SYTO 16 | ★★★ |
| SYTO 9 | ★★ |
| SYTO RNASelect geen fluorescent cell stain | ★★ |
| SYTOX Green-DNA | ★★ |
| TO-PRO-1 | ★★ |
| TOTO-1 | ★★ |
| TurboGFP | ★★ |
| Vybrant DyeCycle Green | ★★ |
| wtGFP (wild type GFP, non UV excitation) | ★★★ |

| | |
|---|---|
| wtGFP (wild type GFP, non-UV excitation) | ★★★ |
| YFP (yellow GFP) | ★★ |
| YO-PRO-1 | ★★★ |
| YOYO-1 | ★★★ |

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★★ indicates a good match between fluorophore and filter set, with actual performance dependent on other experimental conditions.

## Orange

| Fluorophore | Compatibility |
|---|---|
| 2-dodecylresorufin-lipid | ★★★ |
| 5-ROX (carboxy-X-rhodamine) | ★★★ |
| 5-TAMRA (5-carboxytetramethylrhodamine, pH 7.0) | ★★ |
| 7-AAD | ★★ |
| Alexa Fluor® 546 | ★★ |
| Alexa Fluor® 555 | ★★ |
| Alexa Fluor® 568 | ★★★ |
| Alexa Fluor® 594 | ★★ |
| Amplex UltraRed peroxidation product-pH 7.5 | ★★ |
| AsRed 2 | ★★ |
| ATTO 550 | ★★ |
| ATTO 565 | ★★★ |
| ATTO 590 | ★★ |
| BOBO™-3 | ★★★ |
| BODIPY TMR-X | ★★ |
| BODIPY TR-X (MeOH) | ★★ |
| BODIPY TR-X phallacidin | ★★ |
| Calcium Crimson | ★★ |
| Calcium Orange | ★★ |
| CellTrace BODIPY TR methyl ester | ★★ |
| CellTracker Red CMTPX | ★★ |
| Cy3.5™ | ★★★ |
| Dendra2 (Red) | ★★ |
| DiI | ★★ |
| DsRed | ★★★ |
| DsRed-Express | ★★★ |
| dTomato | ★★★ |
| DY-590 | ★★ |
| DyLight 594 | ★★ |
| Ethidium bromide | ★★ |
| Ethidium homodimer | ★★ |
| FluoSpheres Red fluorescent microspheres | ★★★ |
| HcRed1 | ★★ |
| HCS LipidTOX Red neutral lipid stain | ★★ |
| HCS LipidTOX Red phospholipidosis | ★★ |
| HiLyte Fluor™ 594 | ★★ |
| KFP-Red | ★★★ |
| LIVE-DEAD Fixable Red Dead Cell Stain | ★★ |
| LOLO-1 | ★★ |
| LysoTracker Red | ★★★ |
| Magnesium Orange | ★★ |
| mApple | ★★★ |
| mCherry | ★★ |
| Merocyanine 540 | ★★ |
| MitoTracker™ Orange | ★★ |
| MitoTracker™ Red | ★★★ |
| mKate2 | ★★ |
| mOrange | ★★ |
| mOrange2 | ★★ |

| | |
|---|---|
| mOrange2 | ★★ |
| mRFP | ★★★ |
| mRFP1 | ★★ |
| mRuby | ★★★ |
| mStrawberry | ★★★ |
| mTangerine | ★★★ |
| Nile red-phospolipid | ★★ |
| Nile red-triglyceride | ★★ |
| OFP | ★★ |
| Orange 552 | ★★ |
| pHrodo™, succinimidyl ester | ★★★ |
| POPO-3 | ★★ |
| Propidium Iodide (PI) | ★★ |
| Pro-Q Diamond | ★★★ |
| Qdot® 585 Nanocrystals | ★★★ |
| Qdot® 605 Nanocrystals | ★★ |
| Qdot® 625 Nanocrystals | ★★ |
| ReAsH-CCPGCC | ★★ |
| Red 580 | ★★ |
| Resorufin | ★★★ |
| Rhod-2 | ★★ |
| Rhodamine phalloidin | ★★ |
| Rhodamine Red-X | ★★★ |
| SNARF (carboxy) 514 Excitation pH 9 | ★★ |
| SNARF-1 488nm (ph 6.0) | ★★★ |
| SNARF-1 488nm (ph 9.0) | ★★ |
| SNARF-1 514nm (ph 6.0) | ★★★ |
| SNARF-1 514nm (ph 9.0) | ★★ |
| SpectrumOrange | ★★★ |
| Sulforhodamine 101-EtOH | ★★★ |
| SYTOX Orange | ★★ |
| Tetramethylrhodamine dextran | ★★ |
| Texas Red dextran | ★★ |
| Texas Red DHPE | ★★ |
| Texas Red® | ★★ |
| **TRITC (Tetramethylrhodamine)** | ★★★★ |
| TurboFP635(Katushka) | ★★ |
| TurboRFP | ★★ |
| X-Rhod-1 Indicator | ★★ |

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**Red**

| Fluorophore | Compatibility |
|---|---|
| Alexa Fluor® 647 | ★★★ |
| Alexa Fluor® 660 | ★★★ |
| Alexa Fluor® 680 | ★★ |
| APC | ★★ |
| APC (Allophycocyanin) | ★★ |
| ATTO 635 | ★★ |
| ATTO 647 | ★★★ |
| ATTO 647N | ★★★ |
| ATTO 655 | ★★★ |
| ATTO 680 | ★★ |
| BODIPY 650/665-X | ★★ |
| Cy5.5™ | ★★ |
| **Cy5™** | ★★★★ |

| | |
|---|---|
| DDAO | ★★ |
| DiD (DiIC18(5)) - Lipophilic Tracer | ★★★ |
| DY-630 | ★★ |
| DY-675 | ★★ |
| DyLight 649 | ★★★ |
| DyLight 680 | ★★ |
| FluoSpheres Dark Red fluorescent microspheres | ★★★ |
| HiLyte Fluor™ 647 | ★★★ |
| LIVE-DEAD Fixable Far Red Dead Cell Stain | ★★★ |
| MitoTracker™ Deep Red | ★★ |
| Nile blue-EtOH | ★★ |
| Red 650 | ★★★ |
| SpectrumFRed (Far Red) | ★★★ |
| SYTO 60 | ★★★ |
| SYTOX Red-DNA | ★★ |
| TO-PRO-3 | ★★ |
| TOTO-3 | ★★ |

★★★★ indicates this filter set was specifically optimized for this fluorophore.

★★★ indicates an excellent spectral match between fluorophore and filter set that should result in nearly ideal performance in most situations.

★★ indicates a good match between fluorophore and filter set, with actual performance dependent on other experimental conditions.

**Deep Red**

| Fluorophore | Compatibility |
|---|---|
| Alexa Fluor® 750 | ★★★ |
| Alexa Fluor® 790 | ★★ |
| ATTO 725 | ★★ |
| ATTO 740 | ★★★ |
| **Cy7™** | ★★★★ |
| DiR | ★★★ |
| DY-781 | ★★ |
| DyLight 750 | ★★★ |
| DyLight 800 | ★★ |
| HiLyte Fluor™ 750 | ★★★ |
| IRDye 800 CW-MeOH | ★★ |
| IRDye 800CW | ★★ |
| IRDye 800CW-NHS Ester | ★★ |
| IRDye 800RS | ★★ |
| LIVE-DEAD Fixable Near-IR Dead Cell Stain | ★★★ |
| Qdot® 800 Nanocrystals | ★★ |

**Technical Information**

| Topic | Description |
|---|---|
| High Performance Microscopy | An overview of high performance microscopy, including solutions from Semrock and additional learning resources. |
| Spectral Modeling in Fluorescence Microscopy | Discusses various sources of noise in fluorescence microscopy and how to maximize signal-to-noise ratios using software, sample preparation and optical filter selection |
| New Optical Filters Improve High-Speed Multicolor Fluorescence Imaging | Turan Erdogan, PhD, Semrock Inc., BioPhotonics, March 2006<br>Compares benefits and drawbacks of full multiband, pinkel and sedat filter sets for high-speed multicolor fluorescence imaging |
| Multiband Filter Set Terminology | Compares benefits and drawbacks of full multiband, pinkel and sedat filter sets |
| Orientation of Filters in a Microscope | A guide to properly orienting Semrock filters based on the filter markings. |
| Introduction to Fluorescence Filters | Shows how optical filters are used in a traditional fluorescence microscope and describes important factors to consider when choosing optical filters. |
| Filter Reliability | Compares the performance and reliability of hard coated filters to traditional soft-coated filters and provides information about the testing standards for Semrock filters |
| Cube Assembly Instructions | PDF and video instruction for installing filters into popular filter cubes |
| Cleaning Optical Filters | Instructions for cleaning hard coated optical filters |