

BD Horizon Brilliant™ Violet 510 Analyte Specific Reagents

Violet Laser Reagents

Features

- Offers an additional bright option for the violet laser
- Provides excellent population resolution, especially for dim populations
- Supports multiplexing with other BD ASRs
- Developed using Nobel Prize winning chemistry

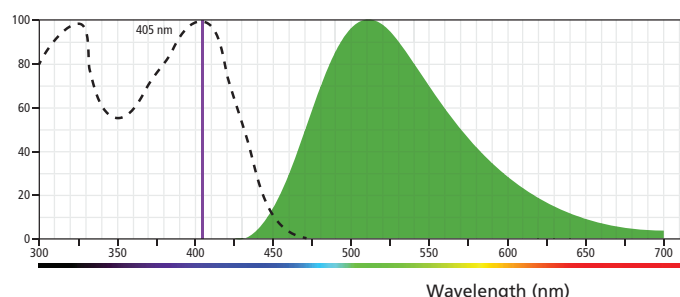


Figure 1. Absorption and emission spectra: excitation maximum: 405 nm, emission maximum: 510 nm. Filter: 525/50 nm.

Resolution (Stain Index)			BD Horizon BV510 Resolution Relative to
Specificity (Clone)	BD Horizon BV510	BD Horizon V500-C	BD Horizon V500-C
CD4 (SK3)	165	21	7.86
CD45 (2D1)	90	49	1.84

Table 1. BD Horizon Brilliant Violet 510 exhibits a stain index significantly larger than BD Horizon V500-C

Stain Index comparison. Lysed whole blood stained with BD Horizon Brilliant Violet 510 and BD Horizon V500-C. All conjugates were run at optimal concentrations on a 10-color BD FACSCanto™ flow cytometer.

BD Horizon Brilliant™ Violet 510 expands options for multicolor panel design

BD Horizon Brilliant™ Violet 510 (BV510), brighter than the BD Horizon™ V500-C dye within the same channel, is particularly useful in resolving dim populations. Now available as analyte specific reagents (ASRs), the dye expands options for multicolor panel design through the use of the violet laser. Additionally, the dye's stability under light and in standard buffers, and compatibility with blood collection tubes offer ease-of-use for a range of applications.

Bright dye for the violet laser

BD Horizon Brilliant Violet 510 is a polymer-based dye developed using Nobel Prize winning chemistry that supports flexibility in multicolor panel design. With a maximum excitation of 405 nm and an emission peak at 510 nm (Figure 1), BD Horizon Brilliant Violet 510 can be used on flow cytometers equipped with a violet laser and appropriate filters, such as the 8-color (4-2-2 configuration) or 10-color BD FACSCanto™ flow cytometer*. A brighter alternative to BD Horizon™ V500-C (Table 1), the dye enables improved resolution (Figure 2), helpful for dim population identification.

Compatible with multiplexing for multicolor flexibility

BD Horizon Brilliant Violet 510 ASRs are compatible in combination with ASRs that use other BD dyes, supporting multicolor experiments.**

Stable for a range of workflows

BD Horizon Brilliant Violet 510 ASRs are stable in ambient light for at least 24 hours and also stable at room temperature for at least 24 hours following whole blood staining and fixation with 1% paraformaldehyde. Additionally, they are able to be used with common buffers and other fixatives for cell surface staining, expanding options for staining protocols. This, combined with their compatibility with both EDTA and heparin blood collection tubes, offers ease-of-use for a range of laboratory protocols.

* Seven- to ten-color assays are for Research Use Only.

** If two or more BD Horizon Brilliant dyes are combined in the same multicolor staining cocktail, the dyes may interact with each other without the use of a buffering solution, such as the BD Horizon™ Brilliant Stain Buffer.

BD Horizon Brilliant™ Violet 510 Analyte Specific Reagents

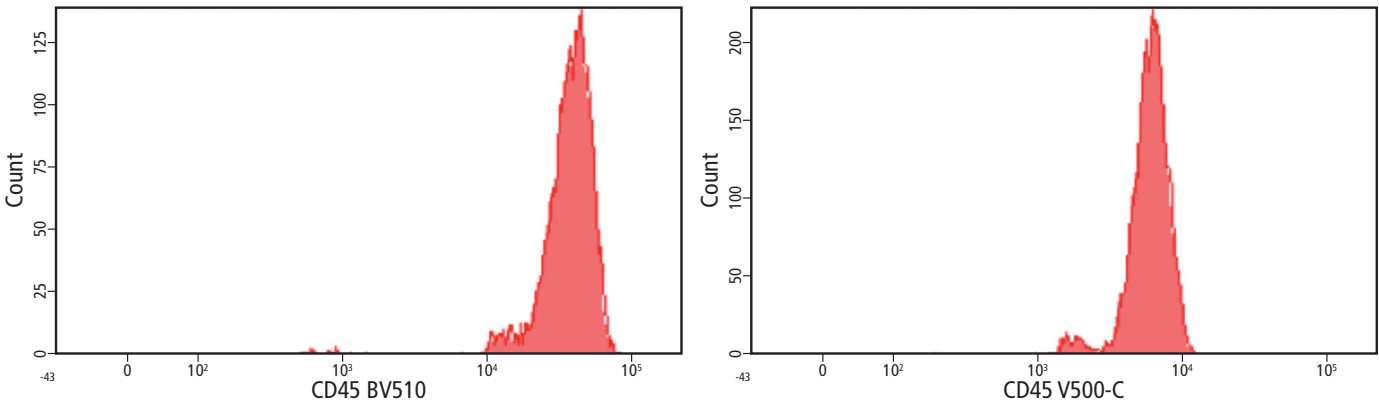


Figure 2. BD Horizon Brilliant Violet 510 stained cells demonstrate better resolution compared to cells stained with BD Horizon V500-C
Lysed whole blood stained with BD Horizon Brilliant Violet 510 and BD Horizon V500-C conjugated to CD45 (2D1) gated on lymphocytes on a 10-color BD FACSCanto™ flow cytometer.

BD Horizon Brilliant Violet 510 Analyte Specific Reagents

Description	React.	Clone	Isotype	Size	Cat.No.
CD4	Hu	SK3	Ms IgG ₁ , κ	100 Tests	659454
CD19	Hu	SJ25C1	Ms IgG ₁ , κ	100 Tests	659455
CD45	Hu	2D1	Ms IgG ₁ , κ	100 Tests	659482
CD56	Hu	NCAM16.2	Ms IgG _{2b} , κ	100 Tests	659457
Anti-HLA-DR	Hu	L243	Ms IgG _{2b} , κ	100 Tests	659458
Mouse IgG1 Isotype Reagent	Hu	X40	Ms IgG ₁ , κ	100 Tests	659459

