SAPE Conjugate Performance and Stability from Moss Inc.

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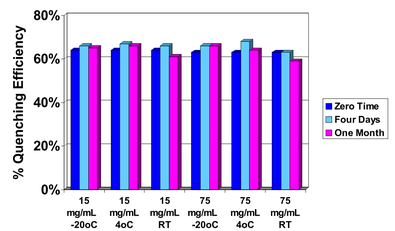
Introduction

- Moss Inc. streptavidin-R-phycoerythrin (SAPE) conjugates excel in diagnostic, molecular and cellular fluorescence detection assays based on biotin labeling
- Moss SAPE conjugates are provided in liquid stable form and are suitable for use in various immunoassay, flow cytometry, and multiplexing platforms such as the Luminex and microarrays
- Moss SAPE conjugation technology produces conjugates that result in exceptional signal-to-noise ratios, high titers, and the conjugates can also be customized to maximize performance for specific platform applications

Significance of FRET Results

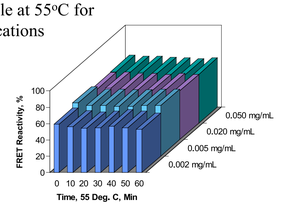
- Bound SAPE donor fluorescence, F, is divided by the fluorescence of the donor alone, Fo
- No binding results in no energy transfer and F/Fo = 1.00
- A binding interaction between donor and acceptor results in fluorescence resonance energy transfer and F/Fo < 1.00
- The smaller the F/Fo value, the stronger the binding interaction

SAPE with 50% Glycerol and 15 or 75 mg/mL BSA Three Temperature Storage Stability

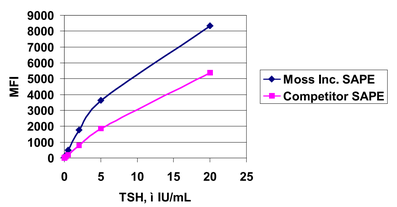


SAPE High Temperature Stability

- SAPE signal is thermostable at 55ºC for PCR applications



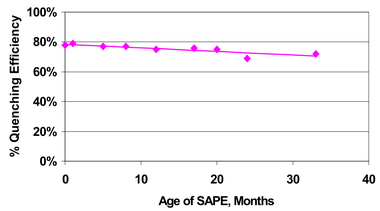
Moss Inc. SAPE Gives Greater Signal Intensity Than a Competitor in a Luminex TSH Assay



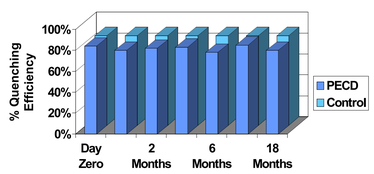
SAPE Performance

- The high biotin affinity of streptavidin combined with the intense fluorescence signal of phycoerythrin make SAPE conjugates among the most sensitive fluorescence detection reagents
- Product Nos. SAPE-001 and SAPE-001NB, available from Moss Inc., are highly sensitive single component reagents that are ready to use for the quantitative detection of biotin bound to a solid phase such as a microsphere or microarray, a biological cell, or in free solution

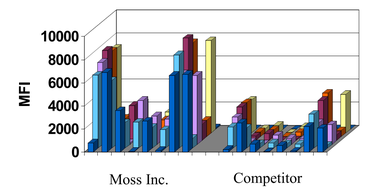
SAPE 30 Months Refrigerated Storage Stability



SAPE 10 ì g/mL Refrigerated Stability in PECD Conjugate Stabilizing Diluent by FRET Quenching Assay



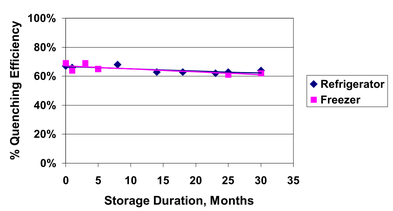
Moss Inc. SAPE Has More Signal Intensity to Detect Bi-Allelic Biotinylated Target Sequences in a Luminex Thrombophilia Assay



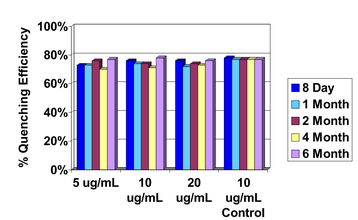
SAPE FRET Test Principle

- The FRET test is a homogeneous assay for testing PE conjugates
- SAPE serves as the fluorescence resonance energy transfer (FRET) donor conjugate in the test
- Biotinylated-allophycocyanin (BAPC) is the energy transfer acceptor conjugate
- Conjugates and reagents are mixed together in microtiter plate wells, and then the fluorescence intensity is measured after 15 minutes

Refrigerator and Freezer Storage Stability of SAPE with 50% Glycerol and 15 mg/mL BSA



SAPE Ambient Temperature Storage Stability of Various Dilutions in PECD Conjugate Stabilizing Diluent by FRET Quenching Assay



Moss Liquid Stable Conjugates

- MOSS Specialized Conjugates are produced in Homogeneous, Liquid Stable form in batches ranging from 10 mg to > 1000 mg. They are suitable for use on various Immunoassay, Flow Cytometry and Multiplexing platforms such as the Luminex . MOSS conjugates produce exceptional signal - to-noise ratios and can be customized for maximum performance.

Catalog #	Description	Quantity (Concentration)
ETG -001	Goat anti-human IgG-PE conjugate	1 ml (1 mg/ml)
ETKF -001	Goat anti-human IgG,Fc(&F(2-PE conjugate	1ml (0,5mg/ml)
ETM -001	Goat anti-human IgM-PE conjugate	1 ml (1 mg/ml)
ETA-001	Goat anti-human IgA-PE conjugate	1 ml (1 mg/ml)
ETE -001	Goat anti-human IgE-PE conjugate	1 ml (1 mg/ml)
SAAP-001	Streptavidin-Alkaline Phosphatase conjugate	1ml (1mg/ml)
SAHRP-001	Streptavidin-HorseRadishPeroxidase conjugate	1ml (1mg/ml)
SAPE-001	Streptavidin-PE conjugate	1ml (1mg/ml)
SAPE-001NB	Streptavidin-PE conjugate (No BSA)	1ml (1mg/ml))
DRG -001	Donkey anti-Rabbit IgG-PE conjugate	1ml (1mg/ml)
DGG -001	Donkey anti-Goat IgG-PE conjugate	1ml (1mg/ml)
GRG -001	Goat anti-Rabbit IgG-PE conjugate	1ml (1mg/ml)
GMG -001	Goat anti-Mouse IgG-PE conjugate	1ml (1mg/ml)

PECD-100	Stabilizing diluent for PE conjugates	100 mls
PECD-500	Stabilizing diluent for PE conjugates	500 mls
PECD-1000	Stabilizing diluent for PE conjugates	1000 mls