

SIGMA Screen™ Streptavidin Coated Plates

For superior binding capacity of biotinylated molecules



With all the assay techniques available today, you need a streptavidin platform capable of binding many types of biotinylated bioactive molecules. Regardless of technique, you also demand the utmost in assay sensitivity. Pre-blocked SIGMA Screen Streptavidin Coated Plates are designed and developed for maximum binding of biotinylated nucleic acids, antibodies, proteins and peptides. In addition, these plates deliver high well-to-well consistency and high plate-to-plate consistency.

The SIGMA Screen Streptavidin coated plates product range of 96- and 384-well coated plates is optimized for high throughput screening. Developed to meet proposed Society of Biomolecular Screening microplate specifications.* SIGMA Screen Streptavidin Coated Plates excel in applications such as immunoassay, kinase assays, genotype determination, nucleic acid analysis, protein/enzymatic activity studies and recombinant fusion protein analysis.

- **Increased binding capacity & signal-to-noise ratios**

Greater than 25 pmol/well for 96-well plates and greater than 4 pmol/well for 384-well plates combined with our pre-blocking step in manufacturing allow SIGMA Screen Streptavidin Coated Plates to provide superior binding capacity with the greatest signal to noise ratios for improved sensitivity!

- **Consistent quality**

Proprietary coating process manufactured under ISO9002 in our GMP facility deliver high well-to-well and plate-to-plate consistency making SIGMA Screen Streptavidin Coated Plates the new standard in high throughput screening.

- **Flexibility in your assay detection**

Offering a variety of 96- and 384-well Corning® base plates designed and validated with all commercial microplate readers and robotic systems in compliance with proposed Society of Biomolecular Screening microplate specifications.*

- **Stable at cooler or room temperatures for added storage convenience**

- **Custom Options**

Special requirements? No problem. Sigma also offers custom coating and packaging options manufactured under our same high-quality ISO9002, GMP facility guidelines. For additional information on our custom capabilities contact us at hts@sial.com and let us know your interests.

* For additional information on SBS microplate standards visit sbsonline.org

SIGMA Screen™ Streptavidin Coated Plates

Superior biotin binding capacity

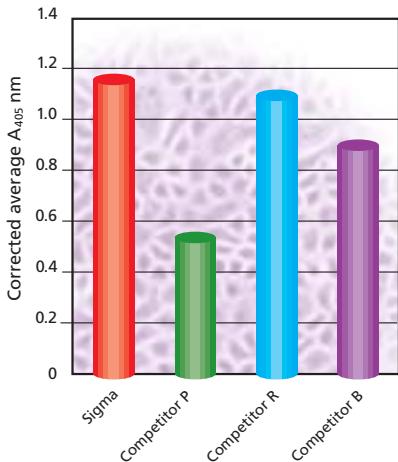


Figure 1: Clear 384-well streptavidin coated plates were incubated with 50 μl well of biotinylated peroxidase in PBST (P 9568). After 30 min at room temperature, plates were washed four times with PBST. Bound biotinylated enzyme levels were quantitated with ABTS substrate (A 9941). Data was collected using a Wallac Victor plate reader.

Stability at cooler or room temperatures

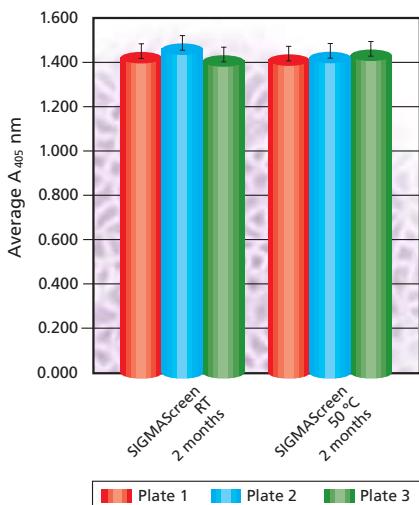


Figure 2: Streptavidin plates (clear 384-well) were incubated at either 50 °C for 2 months or room temperature. The binding capacity was determined by incubating biotinylated peroxidase in 50 μl /well of PBST (P 3563) in 352 wells/plate. Plates were incubated for 30 min at room temperature and washed four times with PBST. The amount of biotinylated enzyme bound per well was determined by ABTS substrate (A 9941). Plates were read in a Wallac Victor plate reader at 405 nm.

Product Specifications

Specification	96-Well Coated Plates	384-Well Coated Plates
Plate composition	polystyrene	polystyrene
Well configuration	Flat	Flat
Well diameter	6.35 mm	3.63 mm ²
Well depth	10.67 mm	10.67 mm
Working volume	100 μl	50 μl
Biotin binding capacity per well	≥ 25 pmoles/well	≥ 4 pmoles/well
Lid	No	No

For further information on our growing line of HTS products, visit us at sigma-aldrich.com/hts

To Order Call: 1-800-325-3010

Technical Service: 1-800-325-5832

Exceptional signal-noise ratios

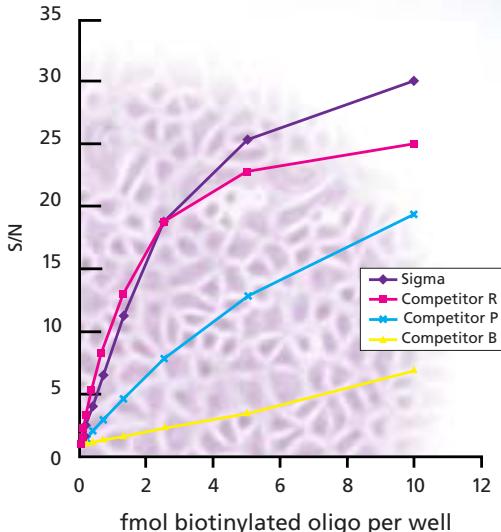


Figure 3: Clear/clear bottom 96-well streptavidin coated plates were incubated with varying amounts of a biotinylated oligonucleotide in PBST (P 3563) for 60 minutes at 37 °C, then washed three times with 300 μl /well of PBST. A complimentary FITC-labeled oligonucleotide was hybridized for 60 minutes at 37 °C. Plates were then washed three times with 300 μl /well of PBST. FITC was detected with anti-fluorescein-peroxidase conjugate in PBST for 60 minutes at room temperature, followed by four washes of PBST at 300 μl /well. Bound biotinylated oligonucleotide was measured with TMB (T 8665).

Ordering Information

Product Code	Description	Pack Size
S 8811	SIGMA Screen Streptavidin Coated Plates, 384-well, black	5 plates 100 plates
M 4058	SIGMA Screen Streptavidin Coated Plates, 96-well, black	5 plates 100 plates
S 8686	SIGMA Screen Streptavidin Coated Plates, 384-well, clear	5 plates 100 plates
M 5432	SIGMA Screen Streptavidin Coated Plates, 96-well, clear	5 plates 100 plates
S 8561	SIGMA Screen Streptavidin Coated Plates, 384-well, white	5 plates 100 plates
M 5557	SIGMA Screen Streptavidin Coated Plates, 96-well, white	5 plates 100 plates
M 3433	SIGMA Screen Streptavidin Coated Strip-Well Plates, 96-well	1 plates 5 plates