



# SZABO SCANDIC

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**Datasheet for FEMTOMAX-110****Chemiluminescent FemtoMax™ Super Sensitive HRP Substrate****Overview**

<b>Description:</b>	Chemiluminescent FemtoMax™ Super Sensitive HRP Substrate for Microwell and/or Membrane (2 component system) - FEMTOMAX-110
<b>Item No.:</b>	FEMTOMAX-110
<b>Size:</b>	110 mL
<b>Applications:</b>	WB, ELISA

**Product Details**

<b>Background:</b>	FemtoMax™ Super Sensitive Chemiluminescent HRP Substrate is an extremely sensitive, nonradioactive, enhanced luminol-based chemiluminescent substrate for the detection of horseradish peroxidase (HRP). FemtoMax™ is designed for both Western blotting and enzyme-linked immunosorbent assay (ELISA) use. FemtoMax™ easily allows for the detection of femtogram (10-15) amounts of antigen using photographic film or other imaging methods, including highly sensitive CCD cameras. Blots can be repeatedly exposed to X-ray film to obtain optimal results or stripped of detection reagents and re-probed. Use the same blotting conditions for FemtoMax™ as you would when using Amersham ECL Plus™ Substrate or Pierce SuperSignal® West Femto Substrate.
<b>Synonyms:</b>	Peroxidase Substrate, ECL HRP Substrate, Chemiluminescent Femtomax™ Super Sensitive horseradish peroxidase (HRP) Substrate For Microwell And/Or Membrane (2 Component System)

**Target Details**

<b>Relevant Links:</b>	<ul style="list-style-type: none"><li><a href="#">FemtoMax SDS</a></li></ul>
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**Application Details**

<b>Tested Applications:</b>	WB
<b>Suggested Applications:</b>	ELISA (Based on references)

**Application Note:** Prepare FemtoMax™ Super Sensitive Chemiluminescent HRP Substrate for use in microwell or membrane applications by mixing 1 mL of Luminol Reagent (Reagent A) with 1 mL of Reaction Buffer (Reagent B). Mix well. Protect from light. Larger or smaller volumes of the substrate can be prepared by mixing components at the same 1:1 ratio. FemtoMax™ Super Sensitive Chemiluminescent HRP Substrate is a highly sensitive detection reagent. Always carefully optimize all components of individual assays (antigens, antibodies, conjugates...) to minimize background reactivity associated with non-specific binding.

**Assay Dilutions:** All assays should be optimized by the user. Recommended dilutions (if any) may be listed below.

**ELISA:** 1X

**WB:** 1X

**Other:** Expiration Date: 26 OCT 2020

## Formulation

**Physical State:** Liquid - clear, colorless, odorless

**Concentration:** 1X

## Shipping & Handling

**Shipping Condition:** Wet Ice

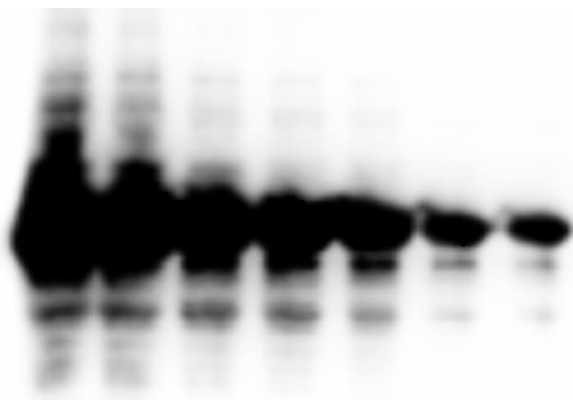
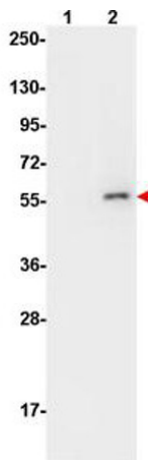
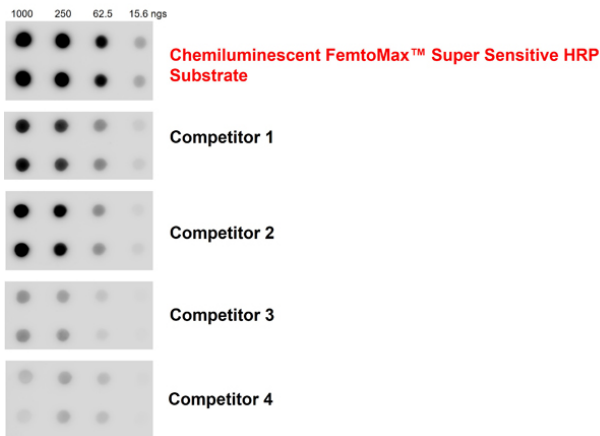
**Storage Condition:** Store Chemiluminescent Substrate at 4° C prior to opening. Protect from moisture and light. No special shipping conditions or precautions are required.

## Images



### Bottle

Chemiluminescent FemtoMax™ Super Sensitive HRP Substrate for Microwell and/or Membrane (2 component system)



### Dot Blot

Chemiluminescent FemtoMax™ Super Sensitive HRP Substrate and competitor comparison.

GAPDH protein was dotted on a nitrocellulose membrane, load 1000, 250, 62.5, 15.6ngs. The membrane was blocked for one hour at room temperature. Primary antibody: Rb anti-GAPDH diluted 1:2000 and incubated at 4°C overnight. After washing, secondary antibody: Gt anti-Rb IgG-HRP diluted 1:50,000 at room temperature for 2 hours. Detection: Chemiluminescent FemtoMax™ Super Sensitive HRP Substrate or competitor 1-4.

### Western Blot

Western Blot of Mouse Anti-AKT pS473 antibody using Femtomax.

Lane 1: non-phosphorylated AKT in untreated cells.  
 Lane 2: phosphorylated AKT (indicated by arrowhead at ~56 kDa) on PDGF stimulated NIH/3T3 cell lysates.

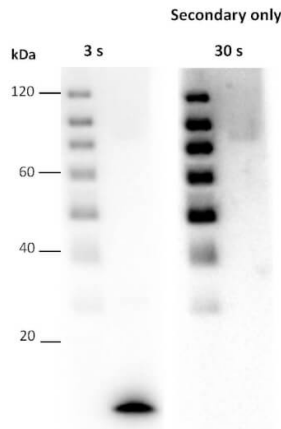
Load: 10 µg per lane.

Primary antibody: AKT pS473 antibody at 1:10,000 in TBS with 0.05% Tween-20 with 1% BSA, for 1 h at 4° C.

Secondary antibody: HRP conjugated Gt-a-Mouse IgG (p/n 610-103-121) was used at a 1:20,000 dilution for 1 h at 4° C with Chemiluminescent FemtoMax™ Super Sensitive HRP Substrate (p/n FEMTOMAX-100).

### Western Blot

Western Blot of anti-GST tag antibody. Lane 1: Recombinant GST tagged recombinant protein [5 ug]. Lane 2: Recombinant GST tagged recombinant protein [2 ug]. Lane 3: Recombinant GST tagged recombinant protein [1 ug]. Lane 4: Recombinant GST tagged recombinant protein [500 ng]. Lane 5: Recombinant GST tagged recombinant protein [250 ng]. Lane 6: Recombinant GST tagged recombinant protein [100 ng]. Lane 7: Recombinant GST tagged recombinant protein [50 ng]. Primary antibody: Anti-GST Antibody at 1:1000 for overnight at 4°C. Secondary antibody: donkey secondary antibody at 1:10,000 for 45 min at RT. Block: 5% BLOTTO overnight at 4°C. Predicted/Observed size: 78 kDa.



### Western Blot

Western blot detection using Chemiluminescent FemtoMax™ HRP Substrate. rPARP1 domain detected at 11 kDa after 3 sec exposure using primary antibody rabbit anti-serum 1:500 overnight, at 4°C. Secondary antibody Peroxidase Goat Anti-Rabbit IgG Antibody at 1:40,000. All incubations were performed in Blocking Buffer for Fluorescent Western Blocking (p/n MB-070).

## References

- Teske NC et al. Pericytes are protective in experimental pneumococcal meningitis through regulating leukocyte infiltration and blood-brain barrier function. *J Neuroinflammation*. (2023)
- Chithelen J et al. The Sphingolipid Inhibitors Ceranib-2 and SKI-II Reduce Measles Virus Replication in Primary Human Lymphocytes: Effects on mTORC1 Downstream Signaling. *Front Physiol*. (2022)
- Pyun JM et al. Plasma Amyloid- $\beta$  Oligomerization Tendency Predicts Amyloid PET Positivity. *Clinical Interventions in Aging* (2021)
- Kim MK et al. A novel GPR119 agonist DA-1241 preserves pancreatic function via the suppression of ER stress and increased PDX1 expression. *Biomed Pharmacother*. (2021)
- Bakri FG et al. Second Report of Chronic Granulomatous Disease in Jordan: Clinical and Genetic Description of 31 Patients From 21 Different Families, Including Families From Lybia and Iraq. *Front Immunol*. (2021)
- Mollin M et al. Clinical, functional and genetic characterization of 16 patients suffering from chronic granulomatous disease variants – identification of 11 novel mutations in CYBB. *Clin Exp Immunol*. (2021)
- Durbano HW et al. Aberrant BMP2 Signaling in Patients Diagnosed with Osteoporosis. *Int J Mol Sci*. (2020)
- Lee JJ et al. Association of Plasma Oligomerized Beta Amyloid with Neurocognitive Battery Using Korean Version of Consortium to Establish a Registry for Alzheimer's Disease in Health Screening Population. *Diagnostics (Basel, Switzerland)* (2020)
- Youn YC. et al. Blood Amyloid- $\beta$  Oligomerization as a Biomarker of Alzheimer's Disease: A Blinded Validation Study. *J Alzheimers Dis*. (2020)
- Brault J. et al. NOX4 is the main NADPH oxidase involved in the early stages of hematopoietic differentiation from human induced pluripotent stem cells. *Free Radic Biol Med*. (2020)
- Zhang L et al. Functional analysis of miR-767-5p during the progression of hepatocellular carcinoma and the clinical relevance of its dysregulation. *Histochem Cell Biol*. (2020)

- Nguyen J et al. A Synthetic Peptide, CK2. 3, Inhibits RANKL-Induced Osteoclastogenesis through BMPRIa and ERK Signaling Pathway. *J Dev Biol.* (2020)
- Grafen A et al. Use of acid ceramidase and sphingosine kinase inhibitors as antiviral compounds against measles virus infection of lymphocytes in vitro. *Front Cell Dev Biol* (2019)
- John V et al. Caveolin-1 controls vesicular TLR2 expression, p38 signaling and T cell suppression in BCG infected murine monocytic myeloid-derived suppressor cells. *Front Immunol.* (2019)
- Kim TH et al. Additive effects of evogliptin in combination with pioglitazone on fasting glucose control through direct and indirect hepatic effects in diabetic mice. *Eur J Pharmacol.* (2018)
- Tiwarekar V et al. APOBEC3G-regulated host factors interfere with measles virus replication: role of REDD1 and mammalian TORC1 inhibition. *J Virol.* (2018)
- Dietrich K et al. Health-Relevant Phenotypes in the Offspring of Mice Given CAR Activators Prior to Pregnancy. *Drug Metab Dispos.* (2018)
- Chung et al. Niche-mediated BMP/SMAD signaling regulates lung alveolar stem cell proliferation and differentiation. *Development* (2018)
- An SSA et al. Dynamic changes of oligomeric amyloid  $\beta$  levels in plasma induced by spiked synthetic A $\beta$ 42. *Alzheimer's Research & Therapy* (2017)
- Wang MJ et al. Oligomeric forms of amyloid- $\beta$  protein in plasma as a potential blood-based biomarker for Alzheimer's disease. *Alzheimer's Research & Therapy* (2017)
- Barfeld SJ et al. c-Myc antagonises the transcriptional activity of the androgen receptor in prostate cancer affecting key gene networks. *EBioMedicine.* (2017)
- Tadokoro T et al. BMP signaling and cellular dynamics during regeneration of airway epithelium from basal progenitors. *Development.* (2016)
- Carter LG et al. Exercise improves glucose disposal and insulin signaling in pregnant mice fed a high fat diet. *J Diabetes Metab.* (2015)
- Wache C et al. Myeloid-related protein 14 promotes inflammation and injury in meningitis. *J Infect Dis.* (2015)
- Beaumel S et al. Identification of NOX2 regions for normal biosynthesis of cytochrome b558 in phagocytes highlighting essential residues for p22phox binding. *Biochem J.* (2014)
- Hohne C et al. High mobility group box 1 prolongs inflammation and worsens disease in pneumococcal meningitis. *Brain.* (2013)
- Huang BW et al. Transcriptional regulation of the human ferritin gene by coordinated regulation of Nrf2 and protein arginine methyltransferases PRMT1 and PRMT4. *FASEB J.* (2013)
- Kim MK et al. Differential protective effects of exenatide, an agonist of GLP-1 receptor and Piragliatin, a glucokinase activator in beta cell response to streptozotocin-induced and endoplasmic reticulum stresses. *PLoS One.* (2013)
- Hoegen T et al. The NLRP3 inflammasome contributes to brain injury in pneumococcal meningitis and is activated through ATP-dependent lysosomal cathepsin B release. *J Immunol.* (2011)

## Disclaimer

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