

# LumiBest 卓越型发光底物说明书

货号: SB-WB011 规格: 50 ml+50 ml; 5\*(50 ml+50 ml)

### 1.产品说明

LumiBest 卓越型发光底物是针对 HRP 系统开发的一款性能卓越的发光 底物。可用于 HRP 标记的 Western Blot 和 ELISA 实验。通用的化学发光物质 Luminol 在辣根过氧化物酶的催化下与稳定过氧化物反应产生化学发光反应, 可以用 X-ray 感光胶片或发光检测仪器检测光强度。再通过光强度对标记的抗 原进行定性或定量检测。LumiBest 对上述传统的发光底物系统进行了革命性 的优化,使得系统的检出限、持续时间、发光强度和试剂的稳定性均得到 了卓越的提升。总体性能评价参数提升超过1亿倍,在实际使用中性能超 过目前全球知名的 Femto 的 fg 级灵敏度系统。

### 2.LumiBest 具有以下特点:

灵敏: 信噪比高,背景低,可检测低于飞摩尔级抗原。

持久: 可提供充足的时间获取所需条带的深度。

便捷:加入底物即可检测。

稳定:长期存放不减低灵敏度。

兼容:对不同实验室的操作习惯兼容性强,新手上手快,更换系统无需

产品性状: A液: 淡黄色至无色液体; B液: 无色液体

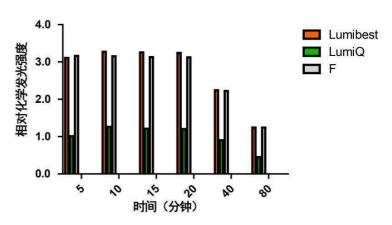
#### 3.所需材料:

- 孵育完毕二抗的 Western blot 膜。
- TBST 或者 PBST 缓冲液。
- 化学发光检测仪器或 X-ray 胶片。 3.
- 如用 X-ray 胶片则需要曝光暗盒和保鲜膜。

### 4.使用方法:

- 按照常规方法进行 Western Blot 实验,二抗孵育结束,用 TBST 或者 PBST 缓冲液将膜清洗三次,每次 5min。
- 取一定体积的 A 液和 B 液,将其 1:1 混匀备用(以一张 6CM \* 9CM 的 PVDF 膜为例, 大约需要 400ul+400ul 的 A 液+B 液, 熟练的实验 者也可以加入更少的体积)。
- 3. 倒干容器内的 TBST 或者 PBST 缓冲液。将混合好的 A 液和 B 液均匀 地淋在膜上,即可开始显色。

## 5.性能测试对比



### 6.常见问题及解决方法:

问题	原因	解决方法
条带发黄		
发光时间变短	二抗浓度过高	减低二抗浓度
条带发黑		
弱信号或没有信号	样品中靶蛋白含量过低	低于检出限,摸索上样
		条件
	样品中没有靶蛋白	追溯样本制备环节
	转膜不完全	延长转膜时间
	二抗变质	重新稀释二抗
背景过深或出现杂带	一抗特异性差	调整一抗浓度
	封闭不完全	延长封闭时间
	封闭液变质	更换新的封闭液
	过度曝光	减少曝光时间



## LumiBest ECL substrate solution kit

**Cat:** SB-WB011; **Size:**50 ml+50 ml; 5\*(50 ml+50 ml)

## **Product Description**

The LumiBest ECL Substrate is an excellent luminescent substrate developed for HRP systems, which can be used for HRP-labeled Western Blot and ELISA experiments. X-ray film or luminometer can be used to detect the light intensity or image. The light intensity of the labeled antigen will be qualitatively or quantitatively detected. LumiBest has revolutionized the traditional ECL substrate system, resulting in excellent detection limits, duration of luminescence and reagent stability. Overall performance evaluation parameters would be enhanced more than one billion times. LumiBest exceed the worldrenowned fg-level sensitivity systems in actual performance.

### LumiBest has the following features

Sensitive: high S/N ratio, low background, femtomole antigens detectable.

Lasting: Provides plenty of time to get the depth of the desired band.

Convenient: Bands immediately apparent without waiting.

Stable: Long-term storage does not reduce the sensitivity. Compatibility: Fit the operating habits from different laboratories. Strong compatibility is easy for novices to get started as well as easy for experts to replace the old system without optimization.

### **Product Character:**

Liquid A: light yellow to colorless liquid; Liquid B: colorless liquid

### Materials needed

- 1. Secondary antibody incubated Western blot membrane.
- 2. TBST or PBST buffer.
- 3. Chemiluminescence detection equipment or X-ray film.
- 4. If using X-ray film you need cassette and plastic film.

#### How to use

- 1. Western Blot experiments were performed as usual and the secondary antibody incubation was completed. The membrane was washed three times for 5 min each with TBST or PBST buffer.
- 2. Take a certain volume of liquid A and liquid B, the 1:1 mixing reserve (For example, a 6CM \* 9CM PVDF membrane needs 400ul + 400ul liquid A + B, skilled experimenter can also add less volume).
- 3. Remove the TBST or PBST buffer in the container. The mixed liquid A + B were evenly leached on the membrane.

## **Troubleshooting**

Problem	Cause	Solution
Yellow band  Light-emitting time getting shorter  Black band	Secondary antibody concentration is too high	Reduce the secondary antibody concentration
Weak signal orno signal	Low target protein content in Sample	Add more antigen
	No target protein in the sample	Check up sample preparation
	Incomplete transfering	Extend the transfer time
	Second antibody degeneration	Make new secondary antibody solution
Background is too dark or appear non-specificity bands	Poor primary antibody specificity	Adjusted primary antibody concentration
	Incomplete blocking	Extend the blocking time
	Blocking solution degeneration	Make new blocking solution
	Overexposure	Reduces exposure time