

## TECHNICAL DATA SHEET – DLAC

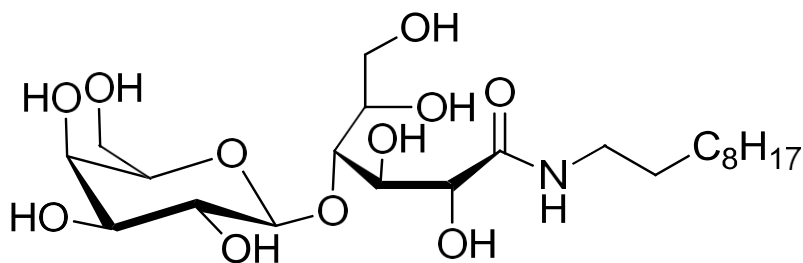
### DLAC

*N*-decylamine lactobionamide

2021

#### Information

<b>Compound Name</b>	<i>DLAC</i>	<b>Physical state</b>	<i>White powder</i>
<b>Catalogue Number</b> <i>(check availability on CALIXAR's website)</i>	<i>DLAC_250MG, DLAC_500MG, DLAC_1G</i>	<b>Purity (HPLC, 214nm)</b>	<i>97%</i>
<b>Molec. Formula</b>	<i>C<sub>22</sub>H<sub>43</sub>NO<sub>11</sub></i>	<b>Retention time (RP<sub>18</sub> HPLC)<sup>b</sup></b>	<i>t<sub>R</sub> = 10.6 min</i>
<b>CAS</b>	<i>nd</i>	<b>CMC</b>	<i>1.3 mM</i>
<b>MW</b>	<i>497.6 g/mol</i>	<b>Exact Mass</b>	<i>497.2836</i>
<b>pKa</b>	<i>na</i>		
<b>Percent composition</b>	<i>C, 53.1; H, 8.71; N, 2.81; O, 35.37</i>		
<b>Stability</b>	<i>Store in &lt;-20°C freezer</i>		
<b>Solubility</b>	<i>Soluble in water (&gt;100 mM), methanol and DMSO</i>		
<b>Structure</b>			



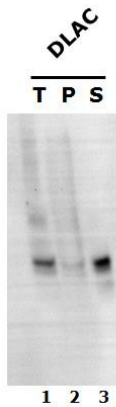
#### References

1- Lebaupain et al., *Langmuir*, 2006, 22 (21), pp 8881–8890

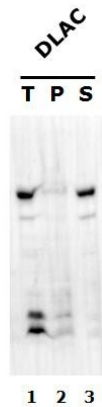
## TECHNICAL DATA SHEET – DLAC

### Biochemical Validation Data

**Target 1  
(GPCR)**



**Target 2  
(Transporter)**



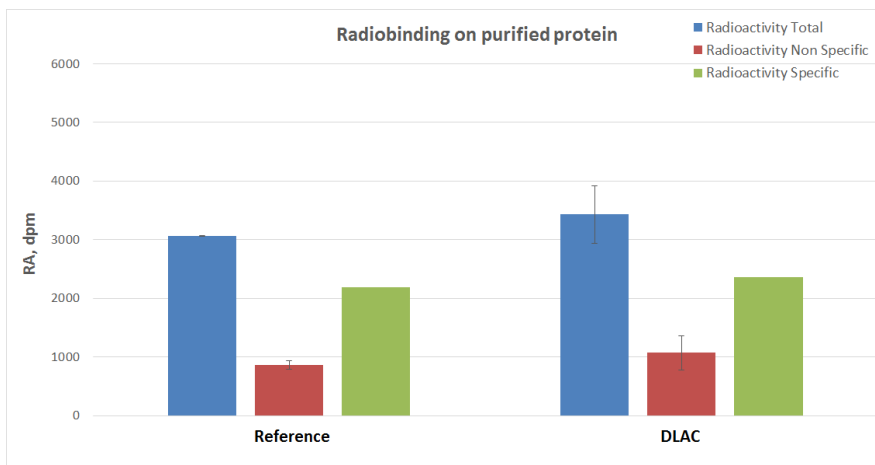
**Target 3  
(Ion channel)**



#### Membrane proteins solubilization.

The 3 targets were extracted from Sf9 membranes (GPCR), E. coli membranes (Transporter) and mammalian membranes (ion channel) by using DLAC reagent at 10-fold the critical micelle concentration (cmc). After solubilization, samples were centrifuged at 100000g. Proteins from pellets (P) and supernatants (S) were separated on a 4-15% Tris-glycine SDS-PAGE, transferred to PVDF membrane and immunodetected with a specific antibody

T = total, P = pellet, S = supernatant.



#### Binding of radioligand on GPCR protein, purified in reference detergent or in DLAC.

Purified protein was incubated with radioligand in absence (total, blue bars) or presence (Non Specific signal, red bars) of an excess of cold ligand. After filtration on GF/C membranes and washing, scintillation agent was added and radioactivity was detected using a Microbeta2. Specific radioactivity (green bars) corresponds to (total signal) – (non-specific signal).

#### Restricted use: Limited Use Label License

The purchase of this product conveys to the purchaser the limited, non-transferable right to use the purchased amount of the product and progeny, to perform internal research and development for the sole benefit of the purchaser.

**Safety:** Not known as a hazardous substance or mixture. General industrial hygiene practices must be followed as the use of adapted personal protective equipment for skin and body.

#### Technical support

For additional product and technical information email our Technical Support team at [contact@calixar.com](mailto:contact@calixar.com).

#### Limited product warranty

TO THE EXTENT ALLOWED BY LAW, CALIXAR WILL NOT BE LIABLE FOR SPECIAL, INCIDENTAL, INDIRECT, PUNITIVE, MULTIPLE OR CONSEQUENTIAL DAMAGES IN CONNECTION WITH OR ARISING FROM THIS DOCUMENT, INCLUDING YOUR USE OF IT.

© 2021 Calixar. All rights reserved. All trademarks are the property of Calixar and its subsidiaries.