

Specification Sheet

CELLINK LAMININK

Product description	The CELLINK LAMININK bioinks include CELLINK LAMININK 111, CELLINK LAMININK 121, CELLINK LAMININK 411, CELLINK LAMININK 521 and CELLINK LAMININK+. These bioinks have been developed to create native-like environment for different cell types with the help of laminin proteins. The CELLINK LAMININK bioinks can be easily crosslinked with the included Ca ²⁺ -containing Crosslinking Agent. To maintain the structure for longer cell culture periods, supplement cell media with calcium as well. For description on how to mix with cells, bioprint and crosslink, follow the Bioprinting Protocol .
Intended use	Biocompatible material for 3D bioprinting, <i>Research Grade</i> . For research use ONLY. Not intended for <i>in vitro</i> diagnostics or <i>in vivo</i> uses. Not intended for administration in humans or animals. Produced under sterile and aseptic conditions.
Product number(s)	IKC20100/200/300/400/500
Shelf life	Minimum 7 weeks, expiration date stated on package.
Storage and handling	Store at 4-8°C. DO NOT FREEZE. Avoid temperature fluctuations. Ensure that the bioink container is capped prior to storage to prevent drying.
Safety	Handle in accordance with good hygiene and laboratory safety practices. Read Safety Data Sheet for more information regarding ingredients and potential hazardous compounds.
Related documents	Bioprinting Protocol as well as Safety Data Sheet can be downloaded from our website https://www.cellink.com/bioinks/cellink-lamininks/ . Scan the QR code below to reach the product webpage.



Property of final bioink	Specification	Method
<i>Appearance</i>	White translucent gel	Visual inspection.
<i>Sterility</i>	Sterile	Tested for the presence of bacteria, fungi and yeast. Tested on raw materials.
<i>Endotoxin level</i>	<5 EU/mL	Limulus Amoebocyte Lysate assay, Pharmacopoeia 2.6.14 "Bacterial endotoxins": Method D, accredited by SWEDAC. Accreditation Certification 1240: ISO 15189, 2010-11-22. Tested on raw material components.
<i>Viscosity</i>	$\geq 5 \text{ kPa}\cdot\text{s}$ at 0.01 s^{-1} ; $\leq 3 \text{ Pa}\cdot\text{s}$ at 200 s^{-1}	Tested using rotational 20 mm plate-plate HR-2 TA Instruments Rheometer. Flow sweep parameters: 25°C, shear rate from 0.001 s^{-1} to 500 s^{-1} .
<i>pH</i>	6.5-7.4	Assessed with pH paper.