

Specification Sheet

ColMA Solution 5 mg/ml

Product description	ColMA is a unique variation of type I collagen that has been modified with photoactive methacrylate groups, enabling it to be crosslinked with light at 365 and 405 nm wavelengths. ColMA solution contains methacrylated collagen at 5 mg/mL concentration. Neutralize it on ice, mix with cells and build 3D cell culture constructs. Recommended for use with BIO X, the Temperature-controlled Printhead and a heated print bed. For description on how to neutralize, mix with cells, cast and crosslink, follow the Neutralization and Printing 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	IK450000
Shelf life	Minimum 2 months, expiration date stated on package.
Storage and handling	Store at 4-8°C. DO NOT FREEZE. Avoid temperature fluctuations.
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	Protocols as well as Safety Data Sheet can be downloaded from our website https://cellink.com/product/colma/ or scan the QR code below.



Property	Specification	Method
<i>Appearance</i>	Transparent to cloudy liquid	Visual inspection.
<i>Sterility</i>	Sterile	Tested for the presence of bacteria, fungi and yeast. Tested on raw material.
<i>Endotoxin level</i>	< 10 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.
<i>pH</i>	3.8-4.8	Assessed with pH meter.
<i>Degree of methacrylation</i>	15-25%	¹ H NMR performed at room temperature, acquired with a spectral width of 8013 Hz, or 16 ppm, averaged over 64 scans using 64K time domain points. Methacrylate peaks present at 5.4, 5.6, and 1.9 ppm.