



emulate

Protocol for Emulate Organ-Chips:

Immunofluorescence Staining of Bile Salt Export Pump
(BSEP) Transporter

April 9, 2019

EP153 v1.0

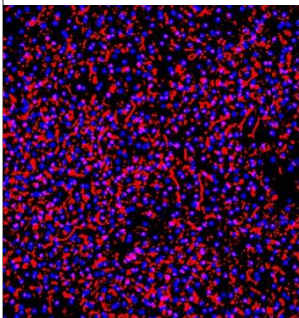
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Goals:	Key Steps:	Other Required Materials:
Visualize bile salt export pump (BSEP) transporter in hepatocytes in fixed Liver-Chip	<ul style="list-style-type: none"> Immunofluorescence staining in Liver-Chip 	<ul style="list-style-type: none"> Anti-ABCB11 antibody (Abcam ab155421) 4% paraformaldehyde (PFA) 10% saponin PBS BSA Normal goat serum (or other serum from the species the secondary antibody was raised in) Alexa Fluor™ 555-conjugated goat anti-rabbit IgG secondary antibody (or other anti-rabbit secondary antibody) Fluorescence microscope

1. Method

Sample type	Fixed Liver-Chip See Protocol EP137 Fixation and Immunofluorescence (IF) Staining.
Recommended fixative and incubation time	4% PFA, 15 minutes at room temperature
Recommended permeabilization and incubation time	1% saponin in PBS, 30 minutes at room temperature
Recommended blocking buffer and incubation time	1% BSA, 10% goat serum in PBS, overnight at 4°C
Recommended primary antibody dilution and incubation time	Anti-ABCB11 antibody (Abcam, ab155421) 1:100 dilution in blocking buffer, overnight at 4°C
Recommended antibody host	Rabbit
Recommended secondary antibody dilution and incubation time	Alexa Fluor™ 555-conjugated goat anti-rabbit IgG secondary antibody 1:500 in blocking buffer, 2 hours at room temperature in the dark

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Representative image		Image of BSEP transporter (red) / nuclei (blue) staining indicating localization of BSEP transporter in the bile canalicular membrane of hepatocytes in the human Liver-Chip (top channel).
More information on vendor site	https://www.abcam.com/abcb11-antibody-ab155421.html	

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