

H-503, FAT STAINS IN SUPERSATURATED ALCOHOL

Fixation: Formalin

Sections: Frozen

Preparing Working Stain:

Dilute 6 ml of stock solution **Sudan IV in Isopropanol** (H-503-1A) or **Oil Red O in Isopropanol** (H-503-1B) or **Sudan III-Isopropanol** (H-503-1C) solution with 4 ml of distilled water. Allow to stand for 5-10 minutes and the filter. The filtrate can be used for several hours.

PROCEDURE:

1. Stain thin frozen sections with the working fat stain for 10 minutes. Wash in tap water.
2. Stain for 5 minutes in either **Mayer's Hematoxylin** (H-503-2) or **Ehrlich's Hematoxylin, Diluted** (H-503-2A).
3. Place in **Sodium Phosphate, 1%** (H-503-3) or in tap water until blue.
4. Float out in water, take up on a slide and mount an Apathy's Gum Syrup or Zwemer's Glychrogel or other soluable aqueous medium.

Stain Results:

Fat	Deep orange-red with Oil Red O(lighter with Sudan IV) Orange-yellow with Sudan II
Nuclei	Blue
Erthrocytes	Sometimes Green
Cytoplasm	Lighter Green

References:

Lillie, R.D. , Histopathologic Technic and Practical Histochemistry, 3rd edition, McGraw-Hill, NY, 1965

Clark, G., (ed) Staining Procedures, 3rd edition, Williams & Wilkins, Baltimore, p. 149, c 1973

