

**FONTANA MASSON SILVER METHOD FOR ARGENTAFFIN GRANULES**

<b>PURPOSE:</b>	For In Vitro Diagnostic Use: Intended for the qualitative demonstration of argentaffin substances.
<b>PRINCIPLE:</b>	Argentaffin substances are able to bind and reduce silver to the visible form. Gold Chloride is used as a toner by replacing some of the bound silver with gold. Sodium Thiosulfate removes excess silver. Nuclear Fast Red is a counterstain.
<b>CONTROL:</b>	Skin <i>Control Slides can be purchased from Histology Control Systems. See inside back cover, Item# cs019.</i>
<b>SPECIMEN PREPARATION:</b>	Formalin fixed, paraffin embedded sections cut at 6 micrometers
<b>SOLUTIONS:</b>	1. Silver Nitrate Solution Fontana Item# s181S 2. Gold Chloride 0.2% Aqueous Item# s202 3. Sodium Thiosulfate 5% Aqueous Item# s1895 4. Nuclear Fast Red Kernechtrot 0.1% Item# s248  <i>Solutions can be purchased separately from Poly Scientific.</i>
<b>NOTES:</b>	Use chemically clean glassware.
<b>REFERENCE:</b>	Luna, Lee G. <u>Histopathologic Methods and Color Atlas of Special Stains and Tissue Artifacts</u> . American Histolabs Inc. Gaithersburg, MD. 1992, pp. 286-287.

**STAINING PROCEDURE:**

1. Deparaffinize and hydrate to distilled water.
2. Place in Silver Nitrate Solution Fontana at 56°C for 1 hour. Sections should be light brown.
3. Rinse sections in distilled water.
4. Place in Gold Chloride 0.2% Aqueous for 5 minutes.
5. Rinse in distilled water, 3 changes.
6. Place in Sodium Thiosulfate 5% Aqueous for 2 minutes.
7. Rinse in distilled water.
8. Place in Nuclear Fast Red Kernechtrot 0.1% for 5 minutes.
9. Rinse in distilled water, 2 changes.
10. Dehydrate in 95% Alcohol, Absolute Alcohol and clear in Xylene, 2 changes each.
11. Mount with Poly Mount (Item# s2153) or any other acceptable mounting medium.

**RESULTS:**

Silver Reducing Substances ..... Black  
Nuclei..... Pink

*Poly Scientific R&D Corp.*

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