

## FACT SHEET/USER INSTRUCTIONS (INTERIM DOCUMENT)

# HARMAN SELENIUM TONER

### TONER FOR THE DISH/TRAY TONING OF BLACK AND WHITE PHOTOGRAPHIC PAPERS

**HARMAN SELENIUM TONER** is a liquid concentrate toner, designed for the dish/tray toning of all black and white photographic papers both resin coated (RC) and traditional fibre based (FB). This toner provides a simple and effective approach for the user wishing to produce Selenium toned prints. It is designed to be used at ambient room temperatures, nominally 20°C/68°F.

**HARMAN SELENIUM TONER** enhances the archival stability, and maximum density of prints. The colour and degree of tonal changes achieved will vary according to the type of paper: ranging from cool chocolate-brown, through purplish brown, to little discernable change. Warm tone papers usually produce the most visible effects. The toner is versatile and convenient to use, with a long working dish life.

#### Health and Safety Information

Toxic if swallowed. May cause sensitisation by skin contact. Keep away from FOOD, DRINK AND ANIMAL FEEDING STUFFS. Avoid contact with skin. In case of accident or if you feel unwell, seek medical advice immediately (show label where possible). Wear suitable gloves and eye/face protection. Keep locked up and out of reach of children. Do not empty into drains, dispose of this material and its container at hazardous or special waste collection point.

#### Additional Safety Information

**HARMAN SELENIUM TONER** is a toxic chemical and therefore it must be handled with appropriate care. When using this product, we strongly recommend that you always work in a well-ventilated area, preferably with some form of air extraction system. You should also ensure that you wear rubber gloves in all use and disposal of this product.

#### Preparation Instructions

Note: Please read this document for the health and safety information and recommendations. A material safety sheet for each product can be obtained from your ILFORD Photo agent or directly from the ILFORD Photo web site at [www.ilfordphoto.com](http://www.ilfordphoto.com). Always wear gloves, glasses and an apron whilst preparing and using chemicals. You will require three separate trays for toning prints. The tray in the centre will hold the HARMAN SELENIUM

TONER. The trays either side of this will hold plain water, 4°C warmer than the HARMAN SELENIUM TONER.

#### Stop, Fix and Wash

Prior to toning, your print should be properly fixed and fully washed. The following chemicals are recommended for these processes:

ILFORD ILFOSTOP stop bath 1+19 for 10 seconds at 18-24°C (64-75°F).

Fixer 18-24°C (64-75°F).	RC paper Time (min)	FB paper Time (min)
ILFORD RAPID Fixer 1+4	½	1
ILFORD RAPID Fixer 1+9	1	2
ILFORD HYPAM Fixer 1+4	½	1
ILFORD HYPAM Fixer 1+9	1	2

#### USER INSTRUCTIONS

Wash RC papers for 2 minutes in fresh running water above 5°C/41°F.

Wash FB double weight papers for 1 hour in fresh running water above 5°C/41°F.

Alternatively, use the ILFORD wash sequence for optimum permanence.

Water above 5°C/41°F	5 minutes
ILFORD WASHAID1+4 @20°C/68°F(with intermittent agitation)	10 minutes
Water above 5°C/41°F	5 minutes

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When washing is complete, place the prints in a holding tray of water, approximately 4°C/39°F warmer than the temperature of your working strength solution of **HARMAN SELENIUM TONER**.

If this is your first experience of toning prints, we suggest that you first make two identical prints and leave one in the holding tray of water to refer to during the toning process. This will help you identify changes in the density and colour as the toning progresses. As you gain experience in toning, you will not find it necessary to use a reference print.

### Mixing Instructions

To make working strength toner for normal toning applications dilute **HARMAN SELENIUM TONER** concentrate 1+3 with water. Where the primary reason is for protection of the image, with minimal tone change, dilute the concentrate 1 + 20 with water. When mixing process solutions always stir them thoroughly before use. The working strength toner should be used at room temperature, nominally 20°C/68°F(+/- 1°C/2°F). Mix your **HARMAN SELENIUM TONER** to the desired dilution and temperature. Be sure to prepare sufficient solution. As a guideline, 3 litres of working solution will be sufficient to use in a tray measuring 12"x16" (30.5x40.6cm). You are now ready to commence toning.

### Toning

Using both hands, take hold of your print by the top corners, lifting it from the holding tray of water. Quickly slide it into the toning solution and then agitate for the whole period of toning by gently rocking the tray.

Protection of the image (as above at the 1+20 dilution) will be complete in 2–4 minutes.

In order to judge any colour changes, do not continually observe the print in the toner as this makes it harder to observe the subtle changes occurring. During the toning process, regularly compare this print to your reference print in the holding tray.

When you are satisfied your print has achieved the desired tonal colour, remove it from the tray and place it into your second holding tray of water. Agitate the print for 30 – 40 seconds, to stop the toning action. If it requires additional toning, simply place the print back into the toning solution and continue as before. When you have achieved the desired level of toning, wash RC prints for a further 2 minutes, fibre prints for 20 minutes in fresh running water above 5°C/41°F. Alternatively for fibre base prints repeat the ILFORD optimum permanence wash sequence.

## USA Warranty

Limited 1-year warranty applicable only in USA.

**ILFORD Photo/HARMAN technology Ltd** will replace this product if defective in manufacture, packaging or labelling, within one year of purchase. Products will only be accepted for return if accompanied by a valid Return Material Authorisation (RMA), and a copy of the dated purchase receipt. To request a RMA please call HARMAN technology at 1-888-372-2338 ext111. Products being returned must be in their original packaging.

Any warranties which may be implied by law are limited to the duration of this express warranty. Any and all liability for incidental and consequential damages other than for personal liability is disclaimed. Some states do not allow limitations on how long an implied warranty lasts, and some states do not allow the exclusion or limitation of incidental or consequential damages so the above limitations may not apply to you. This warranty gives you specific legal rights and you may also have other rights, which vary from state to state.

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