



## Accessories for Industrial X-Ray Inspection

- Darkroom Equipment
  - Radiation Protection
  - Film Viewing Equipment
  - X-Ray Film Cassettes
  - X-Ray Developer
  - X-Ray Films
-



**7<sup>th</sup> Edition 2000**

Published by RICH. SEIFERT & CO. , Ahrensburg

Reference: dr, wch      Date: 20.03.01      File: kat\_e7.p65

**Printed in Germany 2001**

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### Further **SEIFERT** Services for Industry and Science:

#### **Industrial X-Ray**

- |                   |   |
|-------------------|---|
| ♦ ERESKO          | Mobile X-Ray Equipment                        |
| ♦ ISOVOLT         | Stationary X-Ray Equipment                    |
| ♦ VISTALUX        | X-Ray Image Intensifier / Television Systems  |
| ♦ VISTAPLUS II    | X-Ray Image Processing Systems                |
| ♦ SABA 2000T      | Fully automatic (unattended) X-Ray Inspection |
| ♦ DP ... / RP ... | Customer-specific X-Ray Inspection Systems    |

#### **ANALYTICAL X-RAY**

- |                 |                                       |
|-----------------|---------------------------------------|
| ♦ ISO-DEBYEFLEX | X-ray Generators                      |
| ♦ FK-61         | X-ray Tubes                           |
| ♦ XRD 7         | X-ray Diffractometers (compact class) |
| ♦ XRD 3003      | Modular X-Ray Systems                 |
| ♦ RAYFLEX       | Software for Analytical X-Ray         |

#### **CUSTOMER SERVICE**

- ♦ Applications and Tests with X-Ray Measurements and Evaluations
- ♦ User Training Courses
- ♦ Service Courses
- ♦ Telephone and Modem Service
- ♦ Installation, Repair Service and Maintenance
- ♦ Safety Checks



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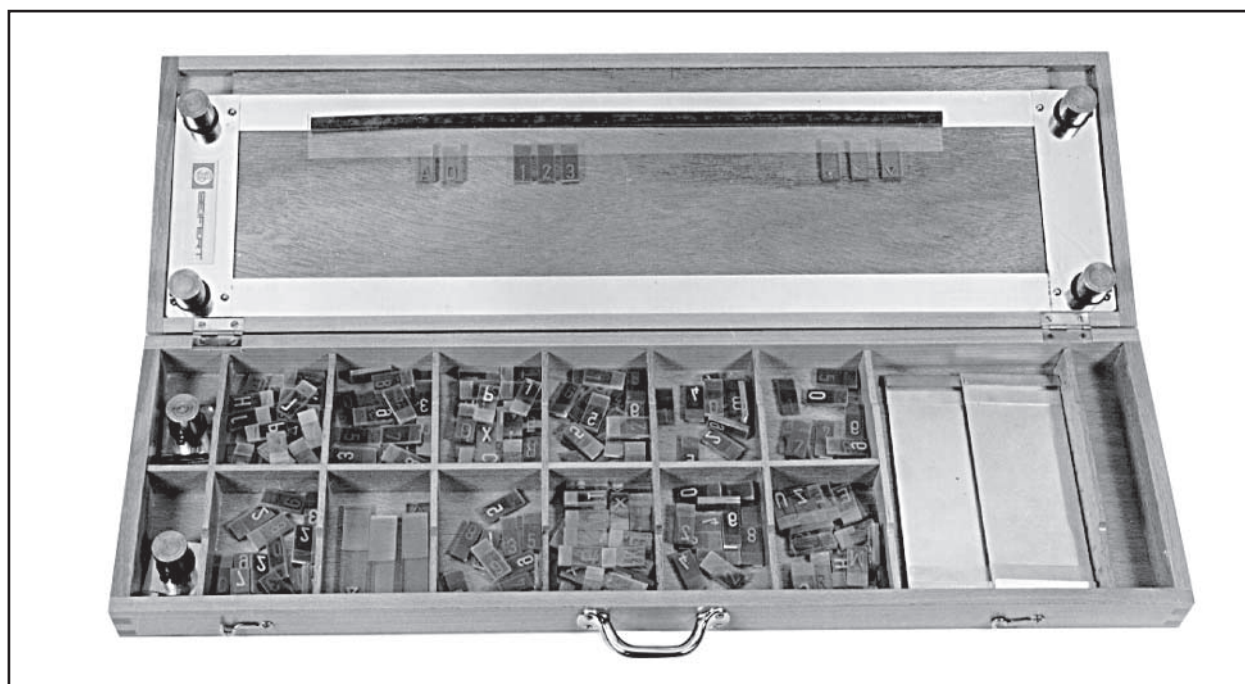
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### X

X-Ray Developer 27



## Wooden storage box with 16 divisions

with a collection of exposure marks  
and accessories for radiography of welds:

1 storage box with

10 sets of figures, 0-9 (100 pcs)

3 sets of letters, A-Z ( 78 pcs)

5 sets ea. points, dashes,  
scale marks, multiplication  
marks, arrows ( 25 pcs)

5 pcs. different arrows

1 pc. base material 10 x 48 cm

2 pcs. holders for penetrameters (DIN)

1 pc. base material strip

1 pc. dto., with magnet

2 pcs. permanent magnet

complete

9.910.43.31.01

9.910.28.31.01

9.910.31.31.01

9.910.33.31.01

9.910.35.31.01

9.910.37.31.01

9.910.38.31.01

9.910.39.31.01

9.910.01.31.01

## Wooden storage box

with plastic insert with 39 divisions  
for exposure marks

9.910.48.31.01



## Lead numbers, 0 - 9

8 mm high

9.910.70.31.02

10 mm high

9.910.71.31.02

13 mm high

9.910.03.31.02

20 mm high

9.910.04.31.02

## Lead letters, A - Z

8 mm high

9.910.72.31.02

10 mm high

9.910.73.31.02

13 mm high

9.910.05.31.02

20 mm high

9.910.06.31.02

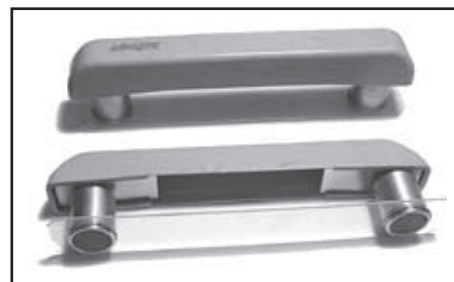
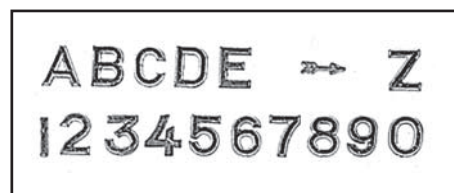
## Lead arrows

length 20 mm

9.910.07.31.02

## Filmholder with 2 permanent magnets

9.964.33.31.01





X-Ray Measuring Tape,  
with buckle, without casing,  
lead figures inserted at distances of 20 cm,  
length 3 m 9.910.10.31.02  
length 6 m 9.910.11.31.04

lead figures inserted at distances of 10 cm,  
length 1 m 9.910.12.31.04  
length 1,5 m 9.910.13.31.04  
length 2 m 9.910.14.31.04  
length 3 m 9.910.15.31.04  
length 6 m 9.910.16.31.04

X-Ray Measuring Tape,  
with buckle, without casing,  
lead figures inserted at distances of 5 cm,  
length 0,5 m 9.910.17.31.04  
length 1 m 9.910.18.31.04  
length 1,5 m 9.910.19.31.04  
length 2 m 9.910.20.31.04  
length 3 m 9.910.21.31.04

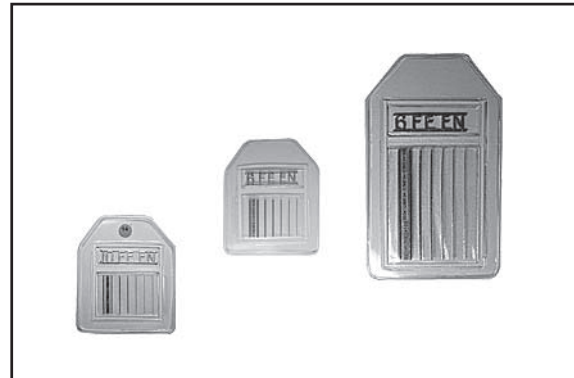
X-Ray Measuring Tape,  
without buckle, at different lengths  
lead figures at distances of  
20 cm 9.910.22.31.04  
10 cm 9.910.23.31.04  
5 cm 9.910.24.31.04

Buckle  
for X-ray measuring tape 9.910.09.31.04

X-Ray Measuring Tape, 7mm wide  
with 3 mm lead numbers at  
1 cm spacing 9.910.75.31.04  
2 cm spacing 9.910.76.31.04  
5 cm spacing 9.910.77.31.04

Casing with brass handle for above tapes,  
for length 3 m 9.910.25.31.04  
for length 6 m 9.910.26.31.04  
for length 12 m 9.910.27.31.04  
for length 20 m 9.910.46.31.04

Zero point marking punch 9.922.91.31.04



**Wire type IQI, with BAM certificate**

EN462-W 1	FE	50 mm	7.181.30.02.91
EN462-W 6	FE	50 mm	7.181.31.02.91
EN462-W 10	FE	50 mm	7.181.32.02.91
EN462-W 13	FE	50 mm	7.181.33.02.91

EN462-W 6	FE	25 mm	7.181.43.02.91
EN462-W 10	FE	25 mm	7.181.44.02.91
EN462-W 13	FE	25 mm	7.181.45.02.91

EN462-W 1	AL	50 mm	7.181.38.02.91
EN462-W 6	AL	50 mm	7.181.39.02.91
EN462-W 10	AL	50 mm	7.181.40.02.91
EN462-W 13	AL	50 mm	7.181.41.02.91

EN462-W 6	AL	25 mm	7.181.51.02.91
EN462-W 10	AL	25 mm	7.181.52.02.91
EN462-W 13	AL	25 mm	7.181.53.02.91

EN462-W 1	CU	50 mm	7.181.34.02.91
EN462-W 6	CU	50 mm	7.181.35.02.91
EN462-W 10	CU	50 mm	7.181.36.02.91
EN462-W 13	CU	50 mm	7.181.37.02.91

EN462-W 6	CU	25 mm	7.181.47.02.91
EN462-W 10	CU	25 mm	7.181.48.02.91

EN462-W 10	TI	50 mm	7.416.91.02.91
EN462-W 13	TI	50 mm	7.416.93.02.91

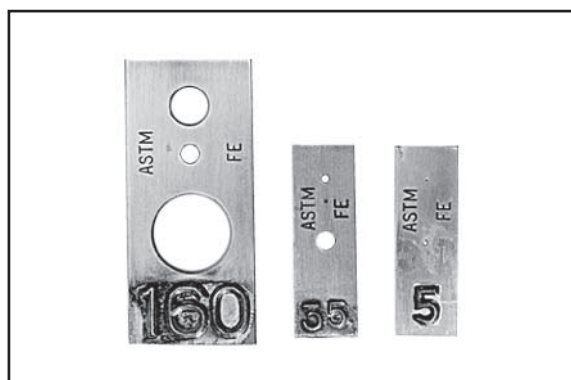
EN462-W 10	TI	25 mm	7.416.92.02.91
EN462-W 13	TI	25 mm	7.416.94.02.91

**Wire type IQI**  
**with declaration of conformity** .....02/91A

**Adhesive tape, black, lightproof**  
19 mm wide, roll of 50 m 9.968.63.31.03

**Adhesive tape, black,**  
30 mm wide, roll of 50 m 9.910.41.31.03

**Adhesive tape,**  
**double-faced adhesive,**  
12 mm wide, roll of 50 m 9.910.42.31.03



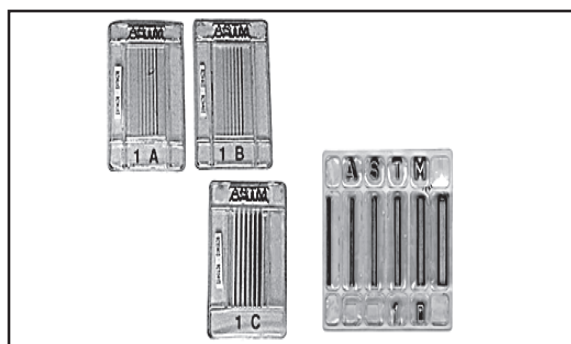
## Hole type Image Quality Indicators I.Q.I., steel, ASTM-E 1025 / ASME SE 1025

### material thickness

	from	to [mm]	
type 5	-	6.3	9.911.70.31.05
type 7	6.3	9.5	9.911.71.31.05
type 10	9.5	12.7	9.911.72.31.05
type 12	12.7	15.9	9.911.73.31.05
type 15	15.9	19.1	9.911.74.31.05
type 17	19.1	22.2	9.911.75.31.05
type 20	22.2	25.4	9.911.76.31.05
type 25	25.4	31.8	9.911.77.31.05
type 30	31.8	38.1	9.911.78.31.05
type 35	38.1	50.8	9.911.79.31.05

### material thickness

	from	to [mm]	
type 40	50.8	63.5	9.911.80.31.05
type 45	63.5	76.2	9.911.81.31.05
type 50	76.2	101.6	9.911.82.31.05
type 60	101.6	152.4	9.911.83.31.05
type 80	152.4	203.2	9.911.84.31.05
type 100	203.2	254.0	9.911.85.31.05
type 120	254.0	304.8	9.911.86.31.05
type 160	304.8	406.4	9.911.87.31.05
type 200	406.4	508.0	9.911.88.31.05



## Wire IQI ASTM 747 Stainless Steel,

Set A	0.08 - 0.25 mm	9.911.30.31.05
Set B	0.25 - 0.81 mm	9.911.31.31.05
Set C	0.81 - 2.50 mm	9.911.32.31.05
Set D	2.50 - 8.00 mm	9.911.33.31.05

## Step-hole type Image Quality Indicators (no fig.)

individually numbered, in case,  
with declaration of conformity

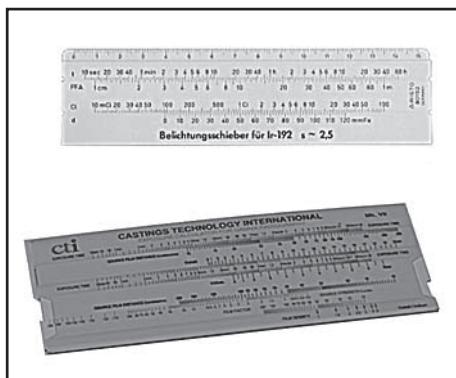
EN 462-2 H 1 FE	9.911.34.31.05
EN 462-2 H 5 FE	9.911.35.31.05
EN 462-2 H 9 FE	9.911.36.31.05
EN 462-2 H13 FE	9.911.37.31.05

## Duplex wire type Image Quality Indicators (no fig.)

Image Quality Indicator EN462 part 5,  
for determination of image sharpness,  
incl. certificate of conformity

EN 462-5 H	9.964.21.31.05
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Exposure slide rule  
for Isotope exposures with Ir 192  
in leather casing

9.911.25.31.06

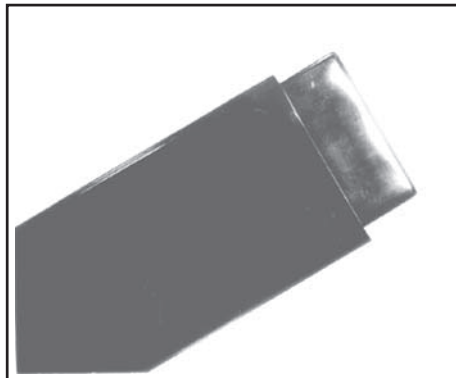
Exposure slide rule  
for Isotope exposures with Ir 192  
Co 60 and Cs 137, suitable for  
all types of films and densities  
in leather casing

9.911.26.31.06



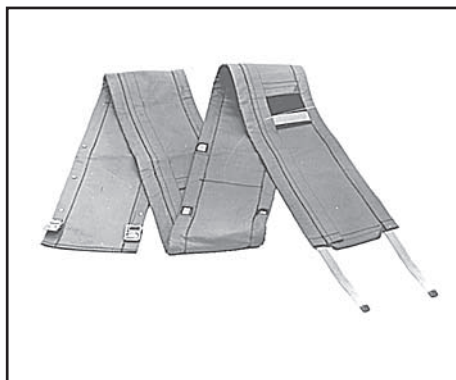
**Metal cassettes**

13 x 18 cm	9.920.16.31.07
18 x 24 cm	9.920.17.31.07
24 x 30 cm	9.920.18.31.07
30 x 40 cm	9.920.19.31.07
35,6 x 35,6 cm	9.920.25.31.07
15 x 40 cm	9.920.26.31.07



**PVC double-pouch cassettes**

18 x 24 cm	9.920.20.31.07
24 x 30 cm	9.920.21.31.07
30 x 40 cm	9.920.22.31.07
15 x 40 cm	9.920.23.31.07
10 x 48 cm	9.920.24.31.07



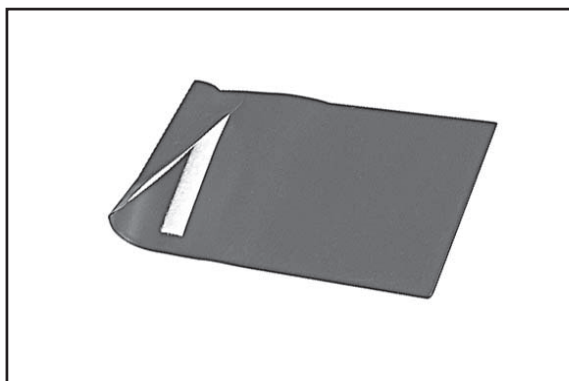
**BELT-TYPE cassettes**  
for films 10 x 48 cm,  
for panoramic exposures

9.920.40.31.07

**BELT-TYPE cassettes**  
for film sizes 10x48 cm,  
for panoramic exposures  
with measuring tape  
with embedded leaden figures  
at distances of 10 cm

9.920.41.31.07





## PVC cassettes

with burdock locking

6 x 24 cm	9.920.30.31.07
6 x 48 cm	9.920.31.31.07
10 x 24 cm	9.920.32.31.07
10 x 48 cm	9.920.33.31.07

## PVC cassettes (no fig.)

0.2 mm, with inside pouch, without locking

6 x 24 cm	9.920.43.31.07
6 x 48 cm	9.920.44.31.07
10 x 24 cm	9.920.46.31.07
10 x 48 cm	9.920.47.31.07

## PVC Cassettes (no fig.)

0.2 mm, with outside pouch, without locking

6 x 24 cm	9.920.00.31.07
6 x 48 cm	9.920.01.31.07
10 x 24 cm	9.920.03.31.07
10 x 48 cm	9.920.04.31.07

## Cassette holder

for nonmagnetic workpieces

9.922.68.31.09



**Rubber tape, 20 mm wide,**  
with clamping buckle,  
up to 1,4 m long  
9.922.65.31.09

**Rubber tape, 25 mm wide,**  
with clamping buckle,  
from 1,5m long

9.922.66.31.09

## PVC cassettes (no fig.)

magnetic, with burdock locking,  
self-adhesive

6 x 24 cm	9.920.10.31.07
6 x 48 cm	9.920.11.31.07
10 x 24 cm	9.920.12.31.07
10 x 48 cm	9.920.13.31.07
30 x 40 cm	9.920.14.31.07

## Magnetic cassette holder

9.922.60.31.09





**Covers against scattered radiation**

1 mm PB, with spring steel lining

6 x 24 cm	9.922.70.31.08
6 x 48 cm	9.922.71.31.08
10 x 24 cm	9.922.73.31.08
10 x 48 cm	9.922.74.31.08
10 x 72 cm	9.922.75.31.08

**Lead covers against scattered radiation**

	0.5 mm thick	1.0 mm thick
6 x 24 cm	9.921.30.31.08	9.921.41.31.08
6 x 48 cm	9.921.31.31.08	9.921.42.31.08
6 x 72 cm	9.921.32.31.08	9.921.43.31.08
10 x 24 cm	9.921.33.31.08	9.921.44.31.08
10 x 48 cm	9.921.34.31.08	9.921.45.31.08
10 x 72 cm	9.921.35.31.08	9.921.46.31.08
13 x 18 cm	9.921.36.31.08	9.921.47.31.08
18 x 24 cm	9.921.37.31.08	9.921.48.31.08
24 x 30 cm	9.921.38.31.08	9.921.49.31.08
30 x 40 cm	9.921.39.31.08	9.921.50.31.08
15 x 40 cm	9.921.40.31.08	9.921.51.31.08

**Tin foils**

	0.5 mm thick	1.0 mm thick
6 x 24 cm	9.923.21.31.08	9.923.32.31.08
6 x 48 cm	9.923.22.31.08	9.923.33.31.08
6 x 72 cm	9.923.23.31.08	9.923.34.31.08
10 x 24 cm	9.923.24.31.08	9.923.35.31.08
10 x 48 cm	9.923.25.31.08	9.923.36.31.08
10 x 72 cm	9.923.26.31.08	9.923.37.31.08
13 x 18 cm	9.923.27.31.08	9.923.38.31.08
18 x 24 cm	9.923.28.31.08	9.923.39.31.08
24 x 30 cm	9.923.29.31.08	9.923.40.31.08
30 x 40 cm	9.923.30.31.08	9.923.41.31.08
15 x 40 cm	9.923.31.31.08	9.923.42.31.08

**Intensifying lead screens in protective polyethylene bags  
cardboard-lined**

	0.02 mm thick	0.1 mm thick
6 x 24 cm	9.921.86.31.08	9.921.93.31.08
6 x 36 cm	9.921.88.31.08	9.921.99.31.08
6 x 48 cm	9.921.87.31.08	9.921.94.31.08
6 x 72 cm	9.921.89.31.08	9.921.95.31.08
10 x 24 cm	9.921.90.31.08	9.921.96.31.08
10 x 40 cm	9.922.52.31.08	9.922.53.31.08
10 x 48 cm	9.921.91.31.08	9.921.97.31.08
10 x 72 cm	9.921.92.31.08	9.921.98.31.08
18 x 24 cm	9.922.40.31.08	9.922.44.31.08
24 x 30 cm	9.922.41.31.08	9.922.45.31.08
30 x 40 cm	9.922.42.31.08	9.922.46.31.08
15 x 40 cm	9.922.43.31.08	9.922.47.31.08

**Intensifying steel screens**

for gamma radiography with Co 60; 0.5 mm

6 x 24 cm	9.922.79.31.08
6 x 48 cm	9.922.80.31.08
10 x 24 cm	9.922.81.31.08
10 x 48 cm	9.922.82.31.08
15 x 40 cm	9.922.83.31.08
30 x 40 cm	9.922.84.31.08

**Pack Intensifying lead screens**

25 pairs, cardboard lined, in protective envelope

	0.02 mm thick	0.1 mm thick
6 x 24 cm	9.923.00.31.08	9.923.11.31.08
6 x 48 cm	9.923.01.31.08	9.923.12.31.08
6 x 72 cm	9.923.02.31.08	9.923.13.31.08
10 x 24 cm	9.923.03.31.08	9.923.14.31.08
10 x 48 cm	9.923.04.31.08	9.923.15.31.08
10 x 72 cm	9.923.05.31.08	9.923.16.31.08
18 x 24 cm	9.923.06.31.08	9.923.17.31.08
24 x 30 cm	9.923.07.31.08	9.923.18.31.08
30 x 40 cm	9.923.08.31.08	9.923.19.31.08
15 x 40 cm	9.923.09.31.08	9.923.20.31.08

## Dose and Dose Rate Meter „RGD 27091“

with ionization chamber for X- and gamma radiation,  
range from 6 keV to 7,5 MeV,

6 linear dose rate measuring ranges:

20, 200, 2000 mSv/h and 20, 200, 2000 mSv/h

3 dose measuring ranges:

20, 200, 2000 mSv

display unit with removable handle, measuring probe with  
wall enforcement cap, extension cable 1,5m, carrying bag,  
transport case, PTB-qualification approval: 23.01/92.02.

Ready for use, including batteries and built in radiation source  
Sr90/Y90 approx. 0.26MBq(7uCi), to be announced to  
administration, no handling permission required 9.964.12.32.01



## Radiameter FH 40 F2

portable, battery powered X- and  
gamma dose ratemeter measuring range

with built-in counter tube:

0.5  $\mu$ Sv/h - 9.9 mSv/h,

energy range 45 keV to 1.3 MeV

PTB No. 23.01/84.09 9.930.78.32.01



## Radiameter FH 40 F4

portable, battery powered X- and  
gamma dose ratemeter measuring range

with built-in counter tube:

1  $\mu$ R/h - 0.99 R/h,

energy range 45 keV to 1.3 MeV

PTB No. 23.01/84.10 9.930.66.32.01



## Radiameter FH 40 G-L

portable, battery powered X-ray and gamma

dose ratemeter. Display range

with built-in counter tube: 10nSv/h - 25mSv/h,

calibrated ranges: 0.1 $\mu$ Sv/h - 25mSv/h

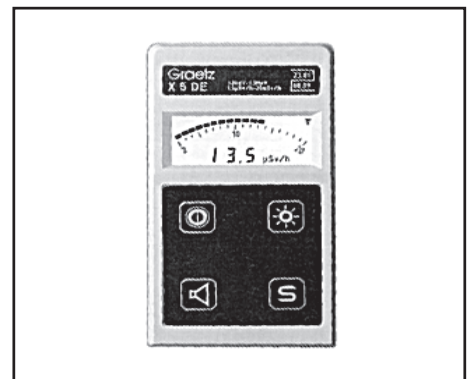
0.1 $\mu$ Sv - 1 Sv

energy range: 36 keV to 1.3 MeV

PTB 23.01/96.06 9.964.36.32.01

## Calibration charge (calibration valid for 2 years)

9.964.39.32.01



## Dose rate measuring device X 5 DE

with digital and bar indication

acc. to DIN 6818 23.01

PTB Test certificate 88.09

for measuring of gamma- and X-radiation

photon energy range : 48 keV - 1.3 MeV

measuring range : 1.5  $\mu$ Sv/h - 20 mSv/h

in 5 automatic changing ranges

warning threshold 7.5  $\mu$ Sv/h

with carrying strap and operation manual

9.931.02.32.01



**Personal Radiation Monitor GPD 100**

with warning function, can be calibrated,  
for measurement of gamma- and X-radiation  
dose range: 5  $\mu$ Sv - 10 Sv  
dose rate range: 30  $\mu$ Sv/h - 1 Sv/h  
4 dose and 4 dose rate thresholds  
freely programmable  
dimensions: 120 x 65 x 22mm  
weight: approx. 130 g  
energy supply by 2x IEC R6 batteries

9.964.35.32.01



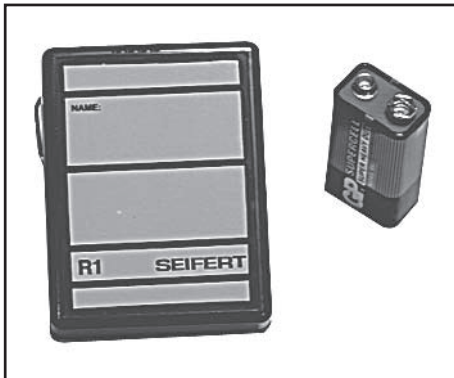
**Personal Radiation Monitor RADMON Type G 6k**

with acoustical warning by increasing  
beep rate (approx. 1 beep/sec at 0.06 mSv/h)  
3 selectable sound levels  
energy range: 50 keV > 2 MeV gamma- and  
X-radiation, with energy compensation  
dimensions: 25 x 50 x 100 mm  
weight: 110 g  
including 1.5 V IEC R6 battery

9.968.39.32.01

Spare battery SUPER 244; 1.5 V

9.930.16.32.01



**Acoustic Pocket Radiation Monitor TESTIMA R1**

continuous warning sound beyond threshold of 50  $\mu$ Sv/h (5 mR/h),  
up to 50  $\mu$ Sv/h dose rate dependent intermittent signal,  
optical indication parallel to the acoustic signal,  
Dimensions: 60 x 80 x 23 mm  
Weight: 90 g incl. Battery

9.968.66.32.01

**Film badge**

plastic with metal clip

9.931.04.32.01



**Dose rate warning device GAMMATEST 30m**

for gamma and X-rays (constant potential equipment)  
at an energy range from 48 keV to 2 MeV,  
with 4 warning thresholds to be selected.  
PTB Nr.: 23.03 / 83.30  
Warning thresholds

7.5 - 25 - 40 - 300  $\mu$ Sv/h

9.930.84.32.01

0.75 - 2.5 - 4 - 30 mR/h

9.930.52.32.01

Spare battery SUPER 244; 1.5 V

9.930.16.32.01

## Dose rate warning system R10S

stationary system with audio and optical indication for monitoring of radiation endangered rooms.  
With continuous function self check.

**External sirene** for R10S (no fig.)

9.968.82.32.01

9.968.83.32.01



## Multi purpose flash lamp SEB 8L

microprocessor contr. operation time disp  
capacity dependend charging  
flash light, auxiliary light  
filament breakage aux. light switch-over  
NC battery, internal battery charger  
operation time approx. 6.5 hours  
Mains voltage 230V +/- 10% 50-60Hz

9.964.01.32.04

## Multi purpose flash lamp SEB 8

same as SEB 8L, but  
no internal battery charger,  
rechargeable by charger LG443

9.964.02.32.04

**Battery charger LG 443** for SEB 8

9.964.02.32.04



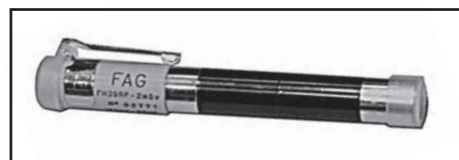
## Electronic Dosimeter EDW150

with 7 digit digital display for  
gamma and X-rays.  
measuring range: 1  $\mu$ Sv - 9999999  $\mu$ Sv  
resolution: 1  $\mu$ Sv  
energy range: 65 keV - 2 MeV  
dose warning thresholds: 200,500,1000 and 2000  $\mu$ Sv/h  
dose rate warning thresh.: 25 and 100  $\mu$ Sv/h  
3 Lady cell size batteries 1,5V LR1

9.964.04.32.01



**Spare battery 1.5 V LR1** (3 batteries necessary)  
9.964.06.32.01c



## Pocket dosimeter FH 39 UP

0-2 mSv, from 40 keV, fountain pen shape,  
for direct reading of the received radiation dose  
(for gamma radiation only)

PTB No. 23.03/91.07, **not calibrated**

9.930.20.32.01

PTB No. 23.03/91.07, **calibrated**

9.930.86.32.01

## Pocket dosimeter FH 39 RP

0-2 mSv, from 18 keV, fountain pen shape,  
for direct reading of the received radiation dose  
(for X-ray and gamma radiation)

PTB No. 23.03/91.09, **not calibrated**

9.930.21.32.01

PTB No. 23.03/91.09, **calibrated**

**Charging device for pocket dosimeter**

battery operated

9.930.25.32.01





◀ **CURIX Printer**

Contact copy system for duplication  
of X-ray exposures  
with integrated electric vacuum pump  
for film sizes 10 x 10cm to 35 x 43cm  
220/240V, 50Hz, max. 400W

9.968.42.34.09

**CURIX DUPLIC.II NIF-film**

100 sheet

Format:	18 x 24 cm	9.968.43.34.09
	20 x 25 cm	9.968.44.34.09
	24 x 30 cm	9.968.45.34.09
	28 x 35 cm	9.968.46.34.09
	30 x 40 cm	9.968.47.34.09
	35 x 35 cm	9.968.48.34.09
	35 x 43 cm	9.968.49.34.09



◀ **Film Processing Equipment**

box type, 9 liters, with joint housing for firmly installed tanks

Tank dimensions:

developing, fixing, and  
intermediate tank 120 x 120 x 600 mm, 8 liters each  
final rins. tank 230 x 120 x 600 mm, 16 liters

9.940.06.33.02



◀ **Film Processing Equipment, 25 liters**

consisting of 5 tanks,  
each with a bottom drain with stopper.

Draining of the individual tanks is  
effected via a common pipe.

Water tanks are provided with water jets  
and water overflow.

All tanks can be covered by a common hinged lid.

Tank capacity:	25 liters	
outer dimensions	695 x 425 x 920 mm	9.941.92.33.02

Same, however

Tank capacity:	30 liters	
outer dimensions	695 x 484 x 920 mm	9.941.93.33.02



## Film Processing Equipment

with thermostatic heating and tap water,  
re-cooling up to max. 20 degrees C,  
developer and fixing bath tanks with hinged covers,  
with thermometer, timer, and cleaning sprinkler,  
circulation pump aggregate for the developer bath,  
with separate draining of the chemical baths

Tank dimensions:

developing tank	30 l, 150 x 350 x 580 mm
intermediate tank	38 l, 190 x 350 x 580 mm
fixing bath tank	30 l, 150 x 350 x 580 mm
final washing tank	80 l, 400 x 350 x 580 mm
wetting agent tank	34 l, 170 x 350 x 280 mm
total dimension	124 x 59 x 102 cm

9.940.02.33.02



## Manual film processing tank system for mobile application

consisting of 5 tanks with each 22 liters capacity,  
individually drainable through a common outlet, complete with  
pressurewater connection for intermediate and final washing.

During transport, all tanks are safely closed by a common hinged cover.

tank dimensions: 140 x 330 x 615 mm

outer dimensions: 800 x 490 x 860 mm

9.941.86.33.02



## Developer bath temperature control

with circulation pump with heating  
and external water cooling,  
thermostatic controlled

9.941.87.33.02

## Automatic Film Processor XR 26

Table top unit, film inlet max. 24 cm wide

Processing time: variable 3 - 20 min.

water consumption: 1.9 l/min.

dimensions: 425 x 473 x 422 mm

power: 230 V, 50 Hz, 1050 W

9.966.22.33.09



## Daylight adaptor DL24

dimensions: 424 x 280 x 373 mm

9.966.23.33.09

## Film Processing Machine AGFA-GEVAERT NDT-U

for processing of industrial

X-ray film from 6 x12 cm to 500 cm long

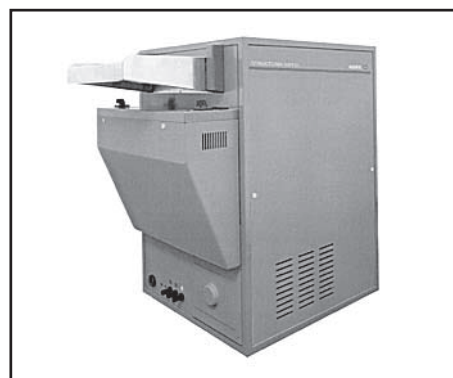
max. width 43.2 cm

processing speed 8 min 28°C

power supply 200-240 V / 50 Hz 16 A

dimensions: 125 x 68 x 106 cm (LxWxH)

9.964.40.33.05



**Set of regenerator tanks** 30 l each

9.964.41.33.05

**Set of regenerator tanks** 80 l each

9.964.42.33.05

**Light protection wall**

9.964.43.33.05

**Structurix feeder**

9.964.44.33.05





◀ **Film Processing Machine AGFA-GEVAERT NDT-S**

for processing of industrial  
X-ray film from 6 x 12 cm to 35 x 43 cm,  
processing time (standard) 8 min at 28 °C  
dimensions: 145 x 71 x 1024 mm (L x W x H)  
Foot print: 71 x 93 cm  
Weight: 230 kg empty, 300 kg filled  
Connection: 200-240 V, 50/60 Hz, max. 3300 W  
Tank capacity: 25 liters

9.964.22.33.05

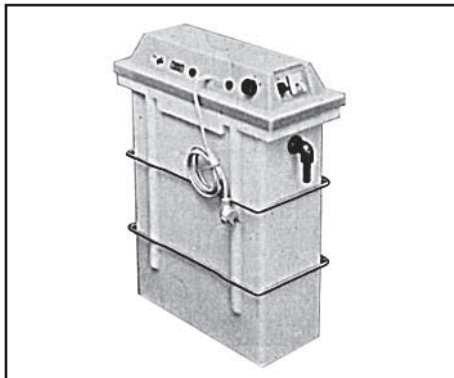
**Accessories (not part of delivery scope)**

- |  |                |
|--|----------------|
| 1 Set of <b>regenerator tanks</b> 2 x 30 liters<br>with level sensors    | 9.964.23.33.05 |
| 1 Set of <b>regenerator tanks</b> 2 x 80 liters<br>without level sensors | 9.964.24.33.05 |
| 1 <b>Water filter</b> with filter cartridge                              | 9.964.25.33.05 |
| 1 <b>Light protection frame</b> for wall gap                             | 9.964.26.33.05 |

**Structurix Feeder S** for NDT-S 9.964.27.33.05

**Universal feeder** magazine 9.964.28.33.05

**Fliptop feeder** magazine 9.964.29.33.05



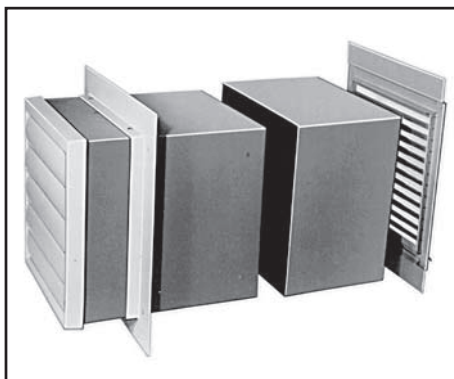
◀ **Silver Recovery Device EL1**

for automatic film processors,  
complete,

Technical data:

max. capacity	12 g AG/h
degree of recovery	95 - 98 %
power input	230V, 50 Hz
connected load	30 W
tank volume	approx. 30 l
exterior dimensions	22 x 54 x 65 cm
weight	10 kg

9.964.49.35.01



◀ **Lab Ventilator 4**

Output: 1.5 cbm/min.  
without heating system,  
made of plastic material feed through  
(for the wall) 20 x 16 cm  
exterior dimensions:  
23 x 19 x 16 cm

9.950.26.33.08

**Intermediate adapter**

(8 cm wide) for lab ventilator 4 9.950.36.33.08

**Venting Chute 4** with air choke 9.950.28.33.08

## Darkroom Timer

equipped with illumin. figures

alarm-clock shape 0 - 15 minutes

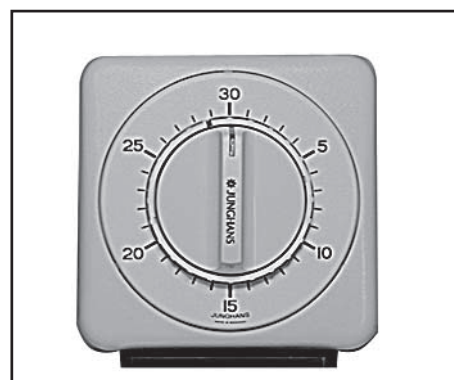
alarm-clock shape 0 - 30 minutes

alarm-clock shape 0 - 60 minutes

9.968.60.33.06

9.968.61.33.06

9.950.00.33.06



## Stop Watch, quartz-controlled

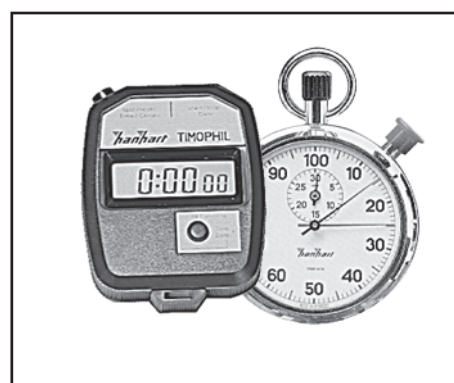
LCD reading 10 mm high,

6-digit reading, running period 59 minutes

weight: 70 grams (with battery)

battery to be operated 12 to 14 months.

9.950.53.33.06



## Stop Watch with analog reading

to check exposure times,

lower housing section chromium-plated

1/5 sec gradation

running period 30 minutes

9.950.51.33.06



## Tank Drain

made of plastic, with 1 m hose,

automatically operated acc. to

the pressure chamber principle,

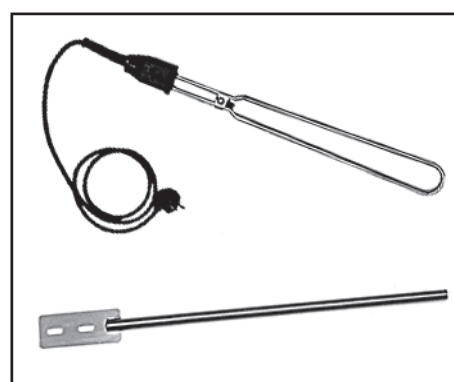
5 liters/minute

9.940.90.33.07

## Immersion Heater with hanger

230 Volt, 500 W, 45 cm long

9.940.91.33.07

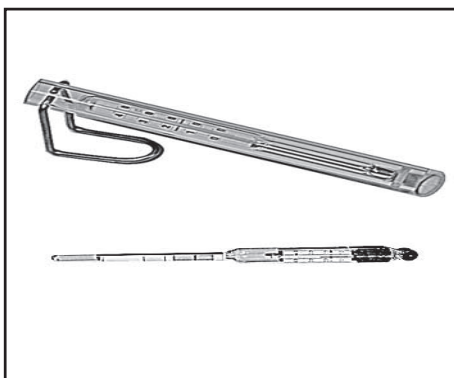


## Stirring Paddle

60 cm long

9.940.92.33.07





◀ **Developer thermometer**  
with hanger

9.941.88.33.07

◀ **Tank Spindle**  
with special thermometer, for  
supervision of the chemical baths

9.960.38.35.01

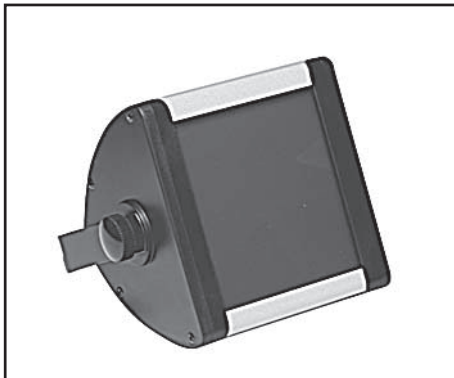


◀ **Krypton Darkroom Lamp**  
for installation at the ceiling,  
for incident light and reflected light,  
with yellow filter

9.950.21.33.06

**Spare Krypton Bulb**  
E27, 40 W, 235 V

9.950.21.33.06

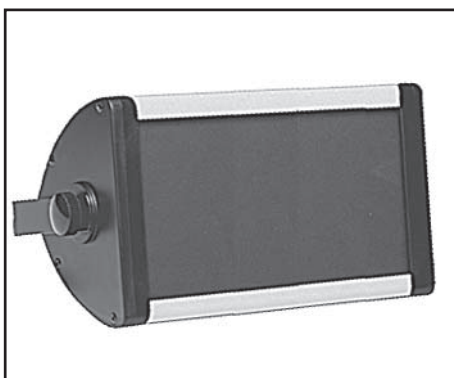


◀ **Darkroom lamp Spot X**  
220 V, 50 Hz, 15 W, E14  
180 x 150 x 140 mm  
double filter system red and orange

9.950.58.33.06

**Darkroom lamp Spot X**  
12V DC 15W E14  
180 x 150 x 140 mm  
double filter system red and orange

9.950.59.33.06



◀ **Fluorescent Darkroom Lamp**  
wall-mounted 15 x 33 cm, to be  
swivelled, also to be used as  
ceiling lamp, including fluo-  
rescent tube and filter

9.950.07.33.06

**Spare Fluorescent Tube**

9.950.09.33.06

**Spare Filter, red**

9.950.44.33.06

**Spare Filter, yellow**

9.950.45.33.06

## Dripping bin

made from PVC for 12 filmframes

9.940.85.33.07

## Film Stripper

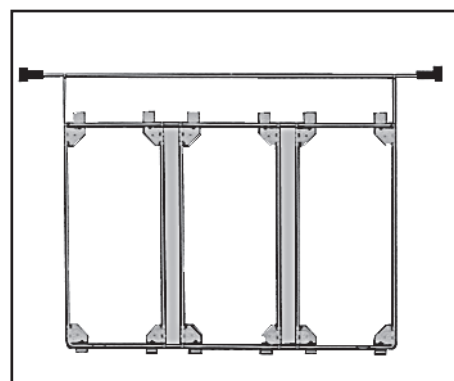
with rubber lips

9.940.30.33.07

## Film Clip Frames

made of stainless steel, corner clipping

6 x 24 cm	9.941.22.33.07
6 x 24 cm , twofold	9.941.23.33.07
6 x 24 cm , threefold	9.941.24.33.07
6 x 48 cm	9.941.71.33.07
6 x 48 cm , twofold	9.941.72.33.07
6 x 48 cm , threefold	9.941.73.33.07
10 x 24 cm	9.941.76.33.07
10 x 24 cm , twofold	9.941.77.33.07
10 x 24 cm , threefold	9.941.78.33.07
10 x 48 cm	9.941.79.33.07
10 x 48 cm , twofold	9.941.80.33.07
10 x 48 cm , threefold	9.941.81.33.07
13 x 18 cm	9.941.25.33.07
18 x 24 cm	9.941.26.33.07
24 x 30 cm	9.941.27.33.07
30 x 40 cm	9.941.28.33.07
35 x 35 cm	9.941.29.33.07



## Slide-in Frames

for films, single frames, equip. with rubber sockets, stainless steel, bar length 46 cm

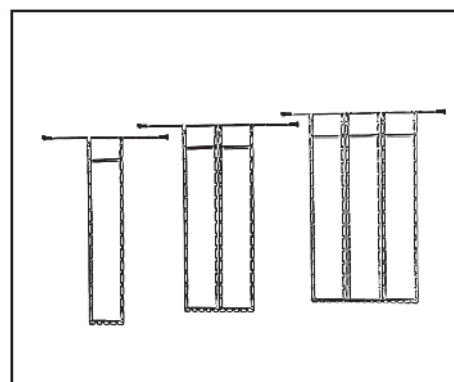
6 x 24 cm	9.941.00.33.07
6 x 48 cm	9.941.01.33.07
6 x 72 cm	9.941.02.33.07
10 x 24 cm	9.941.03.33.07
10 x 48 cm	9.941.04.33.07
10 x 72 cm	9.941.05.33.07

### twofold version

6 x 24 cm	9.941.13.33.07
6 x 48 cm	9.941.14.33.07
10 x 24 cm	9.941.15.33.07
10 x 48 cm	9.941.16.33.07

### threefold version

6 x 24 cm	9.941.17.33.07
6 x 48 cm	9.941.18.33.07
10 x 24 cm	9.941.19.33.07
10 x 48 cm	9.941.20.33.07



## Film Clips

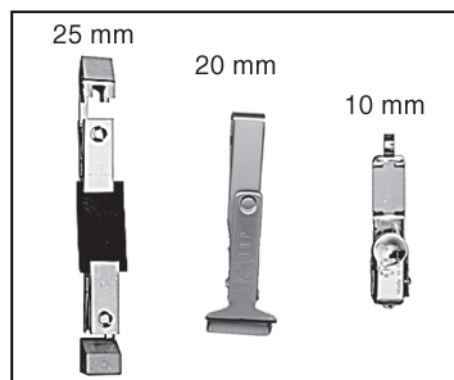
made of stainless steel

10 mm width	9.940.86.33.07
20 mm width	9.966.57.33.07
25 mm width	9.940.37.33.07

## Film Clips

for film drying cabinet

25 mm width (with weight clip)	9.940.38.33.07
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**Film Drying Cabinet**

with hinged door for front loading, with thermostat, fan unit. Metal housing powder coated (RAL7032) frame extension and dripping bin made from stainless steel. Cabinet complies with IEC 601-1. For 20 filmframes up to format 35 x 43 cm and bar length of 46 cm. Max. film length 48 cm.

Technical data:

power input	230 V, 50Hz
heating power	500 Watt
exterior dimensions	60 x 50 x 90 cm
weight	27 kg

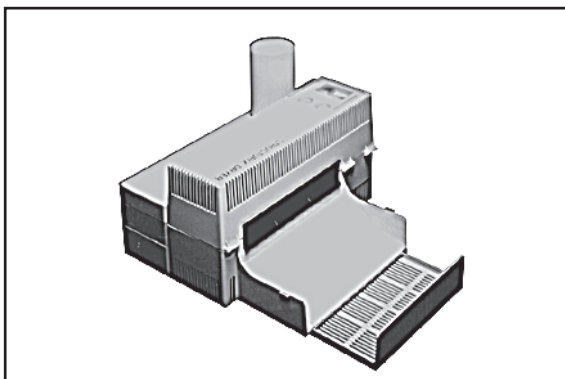
9.964.51.33.08



**AGFA GEVAERT Structurix Dryer DR**

for industrial X-ray films,  
connected load: 220/240 V, 50 Hz  
power input max. 1600 W,  
processing speed: 14 cm/min.

9.930.80.33.08



## Film viewer

for film densities up to 3.7, illuminated area 8.5 x 22 cm  
with cooling fan, heat-protection glass, stepless brightness control,  
and additional pedestal switch,  
complete, with 2 covering blinds and  
3 built-in halogene lamps 24 V / 150W  
connection 230 V, 50 Hz  
9.960.04.34.01

## Heavy duty heat filter

9.950.60.34.01

## Adapter for wet film viewing

9.950.46.34.01



## Film viewer „Longfield“

for film densities up to 3.6, with 10 halogene lamps 24 V / 150 W,  
8.5 x 45 cm illuminated area, with cooling fan, heat-protection glass,  
stepless brightness control and additional pedestal switch,  
complete, with covering mask  
connection 230V, 50 Hz

9.960.01.34.01

## Film viewer „Longfield-S“ (no fig.)

for film densities up to 4.1, with 10 halogene lamps 24V / 150W,  
8.5 x 45 cm illuminated area, heavy duty heat-protection glass,  
cooling fan, stepless brightness control and additional pedestal switch,  
complete, with covering mask  
connection 230V, 50 Hz

9.950.62.34.01

## Spare halogene lamp 24V / 150W

9.960.20.34.01



## Film viewer „SUPER“

with extreme lumminous density,  
d = 4.7  
iris mask 5 - 75 mm diameter,  
adjustable, stepless brightness  
control by pedestal switch

9.960.22.34.01

## Spare-halogene lamp 24 V / 250 Watt

9.960.24.34.01

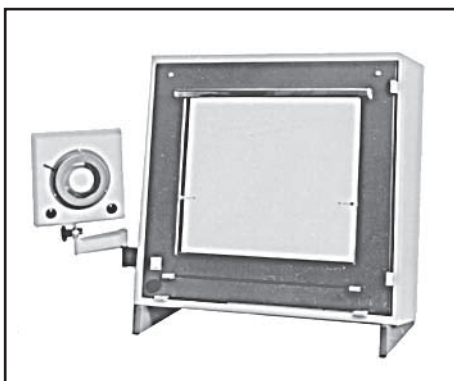


## Film viewer „Universal-Plus“

for film densities up to 4.3  
with 3 halogene lamps, 24 V / 150 W  
illuminated area 12 x 18 cm, with  
cooling fan, stepless brightness control,  
and additional pedestal switch,  
complete, with 3 covering masks  
connection 230V, 50 Hz

9.950.63.34.01





◀ **Film Viewing Device JX**

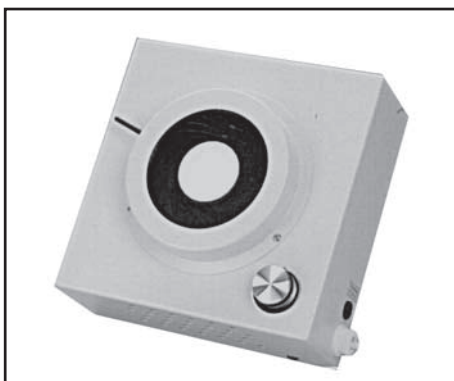
220 V, for floor or wall install, with 4 sliding venetian blinds and 12 fluorescent lamps, each 20 W with stepless electronic brightness regulation, S = 3, wet-film viewing incl. wet-film bar and drip drains.  
illuminated area 48 x 46 cm  
luminance max . 12360 cd/m<sup>2</sup>

9.950.04.34.03

◀ **Iris-Standlamp 100**

5 - 98 mm diameter, S = 3.7, with halogene glow lamp 250 W, incl. 2-step switch  
incl. flange and swivel toggle for fixation to film viewing devices JX

9.950.12.34.05



◀ **Iris-Standlamp 100**

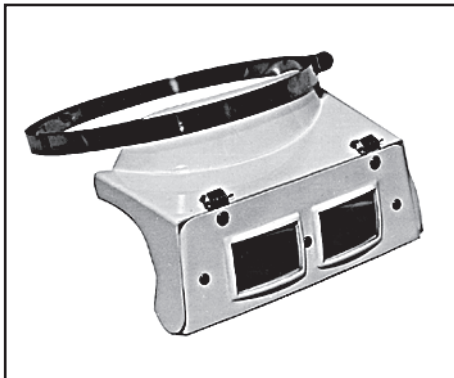
5 - 98 mm diameter, S = 3.7, with halogene glow lamp 250 W, incl. 2-step switch

9.950.55.34.03

**Stepless Electronic Brightness**

**Regulation** for Iris-Standlamp with halogene glow lamp 250 W, incl. 2-step switch

9.950.56.34.03



◀ **Binocular Head Lens**

Zeiss make, magnification 2.0 - fold

9.960.06.34.06



◀ **Hand Lens Aplanat**

consisting of 2 lenses with 90 mm diameter, twofold magnification

9.960.07.34.06



## Transmission densitometer D 200-II

for exact measurement of densities  
up to  $d=6$ , with digital display,  
apertures  $\varnothing 1, \varnothing 2$  and  $\varnothing 3$  mm  
dimensions 47 x 31 x 17.5 cm  
Measuring arm length 32 cm  
illuminated table 37.5 x 31 cm  
weight approx. 7 kg

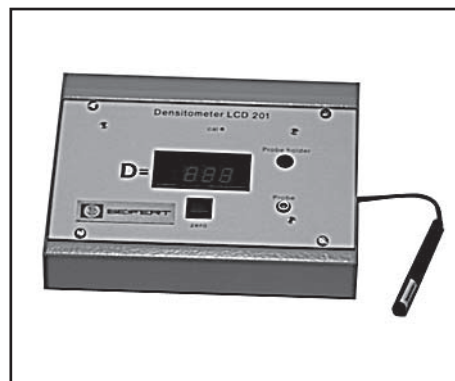
9.964.50.34.07



## Hand-held Probe-Densitometer LCD 201

Table-top unit with digital LED display to measure densities of industrial X-ray films with slim-line pen probe.  
Measuring range 0 - 5,0 (+/- 0.05 absolute)  
Repeatability accuracy +/- 0.01  
Probe aperture diameter 2 mm  
Probe cable 1,3 m long  
semi-automatic push-button zeroing  
for 220 V, 50 Hz power supplies

9.968.32.34.07



## Hand-held Probe-Densitometer LCD 51

Portable unit with digital LCD display to measure densities of industrial X-ray films with slim-line pen probe.  
Measuring range 0 - 5,0 (+/- 0.05 absolute)  
Repeatability accuracy +/- 0.01  
Probe aperture diameter 2 mm  
Probe cable 1,3 m long  
semi-automatic push-button zeroing  
for 9 V battery operation

9.968.33.34.07



## Protection case for LCD 51

9.968.34.34.07

## Calibrated Step Wedge Film (no fig.)

BAM version (German Federal Material Testing Institute),  
for calibration of densitometers,  
density range 0.3-4.6, with  
approx. 10 density references

9.950.48.34.07

## Calibrated Step Wedge Film (no fig.)

AGFA GEVAERT STRUCTURIX DENSTEP  
for calibration of densitometers,  
density range < 0.3 - > 3.9  
Size 35 x 230 mm, 15 steps

9.969.99.34.07



**IIW Reference Catalog**

as per ISO 5817  
with 67 reference cards  
w.exposures f. steel 9.964.32.34.07

**Evaluation Index**

issued by DVS, acc. european  
standard EN 30042 with  
20 reference exposures f.aluminium 9.950.74.34.07

**Reference Catalog ASTM-E 155, Volume 1**

ring binder with radiographs of light alloy  
castings with wall thicknesses  
between 6 and 19 mm,  
containing 25 pictures of  
13 aluminium alloys  
and 10 magnesium alloys 9.966.01.34.07

**Reference Catalog ASTM-E155, Volume 2**

ring binder with radiographs of light alloy  
castings with wall thicknesses  
between 6 and 19 mm,  
with 4 pictures of magnesium castings  
with each evaluation grades 9.966.02.34.07

**Reference Catalog ASTM-E 272**

Ring binder with 45 radiographs of  
high-strength Cu-, Ni-Cu and similar  
alloy castings with typical discontinuities,  
20 pictures of castings 25 mm thick, made  
with X-ray Iridium 192 source,  
25 pictures of castings 75 mm thick,  
made with 2 MeV radiation  
or Co60 source 9.966.07.34.07

**Reference Catalog ASTM-E 310**

Ring binder with 22 reference  
radiographs of tin bronze castings  
with plate thicknesses  
between 19 and 25 mm 9.966.10.34.07

**Reference Catalog ASTM-E 390, Volume 1**

ring binder with radiographs  
of steel fusion welds,  
including 16 plates covering  
base material  
up to and including 6 mm (1/4") 9.966.11.34.07

**Reference Catalog ASTM-E 390, Volume 2**

ring binder with radiographs  
of steel fusion welds,  
including 29 plates covering  
base material  
over 6 mm (1/4") up to 75mm (3") 9.966.12.34.07

**Reference Catalog ASTM-E 390, Volume 3**

ring binder with radiographs  
of steel fusion welds,  
including 32 plates covering  
base material  
over 75 mm (3") up to 200 mm (8") 9.966.13.34.07

**Reference Catalog ASTM-E 192**

foil with 16 radiographs of thin-walled  
steel investment castings for aerospace  
applications 9.966.06.34.07



**Reference Catalog ASTM-E 446, Volume 1**

ring binder with radiographs of steel castings with wall  
thicknesses up to 50 mm ,  
using medium voltage X-rays (250 kV)  
incl. 34 radiographs 9.966.14.34.07

**Reference Catalog ASTM-E 446, Volume 2**

ring binder with radiographs of steel castings with wall  
thicknesses up to 50 mm ,  
using X-radiation 1 MeV and Iridium 192  
incl. 34 radiographs 9.966.15.34.07

**Reference Catalog ASTM-E 446, Volume 3**

ring binder with radiographs of steel castings with wall  
thicknesses up to 50 mm ,  
using X-radiation 2 - 4 MeV  
and Cobalt 60  
incl. 34 radiographs 9.966.16.34.07

**Reference Catalog ASTM-E 186, Volume 1**

ring binder with 28 radiographs of steel castings  
with section thicknesses  
between 50 and 114 mm  
for X-radiation 1 MeV and Iridium 192 9.966.03.34.07

**Reference Catalog ASTM-E 186, Volume 2**

ring binder with 28 radiographs of steel castings  
with section thicknesses  
between 50 and 114 mm  
for X-radiation 2 MeV and Cobalt 60 9.966.04.34.07

**Reference Catalog ASTM-E 186, Volume 3**

ring binder with 28 radiographs of steel castings  
with section thicknesses  
between 50 and 114 mm  
for X-radiation 4 MeV to 30 MeV  
9.966.05.34.07

**Reference Catalog ASTM-E 280, Volume 1**

ring binder with radiographs of heavy walled steel castings  
with section thicknesses between 115 mm and 300 mm  
for X-radiation 2 MeV and Cobalt 60  
incl. 28 radiographs (8 1/2"x11") 9.966.08.34.07

**Reference Catalog ASTM-E 280, Volume 2**

ring binder with radiographs of heavy walled steel castings  
with section thicknesses between 115 mm and 300 mm  
for X-radiation 4 MeV to 30 MeV  
incl. 28 radiographs (8 1/2"x11") 9.966.09.34.07



### Film Storing Cabinet

steel-sheet construction, with hinged door  
for a total of 120 compartments  
each 85 x 90 mm wide, 120 mm high,  
spray-painted: grey,  
RAL 7032 outside  
light grey RAL7035 inside  
Dimensions: height 1,950 mm  
depth 500 mm  
width 1,000 mm

(shipped in detached condition)

9.941.21.34.09



### Film Cutting Machine

with automatic safety device,  
length of cut 360 mm

9.960.21.34.08



### Punching Pliers

with letter, number or figure like  
star, square or triangle to be  
specified upon order.  
plier length 115 mm, mouth 30 mm

9.960.17.34.08

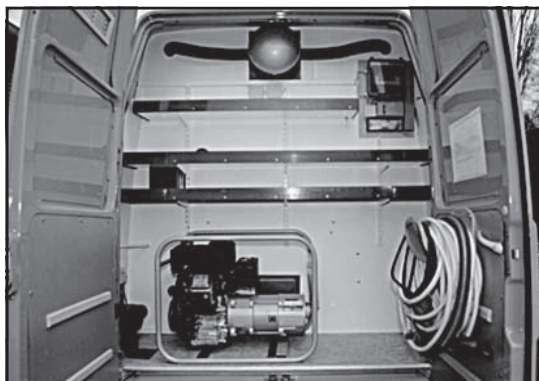
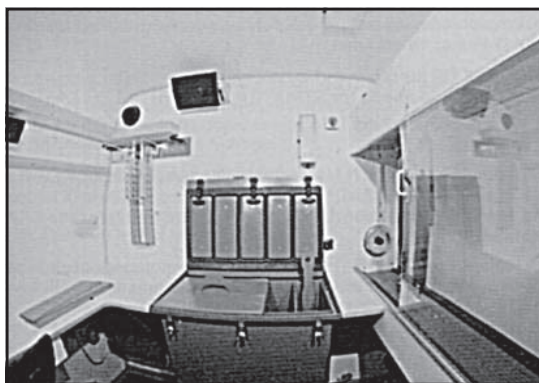
### Perforating pliers (no fig.)

suitable for 1-3 alphanumeric characters  
depending on character size

9.963.97.34.08

### X-ray film marker white (no fig.)

for writing on X-ray films  
9.966.17.34.07



#### Darkroom Van

For over 40 years we have equipped various makers' cars. The basic outfit includes a waterproof and chemicals-resistant laboratory floor lining, thermal insulation of walls and ceilings as well as lining of these areas with white GETALIT panels; furthermore the electric outfit and fresh water connection and water drain are included.

Approved in practice is the 3-room separation consisting of evaluation room, darkroom, and storage room for equipment. The recommended outfit includes wall-mounted cabinets with intermediate shelves, drawers, working desk, corner shelf as storage, manual filmprocessing tank, film drying cabinet, darkroom lamp, timer, and wet film viewer. Upon request stationary heating and/or airconditioners can be installed. Additional outfit for transporation of dangerous goods is also available.

**Containers** can be equipped in the same way.





## X-Ray Developer „G128“

liquid, for manual processing tank with 5 liters  
(for 30 liters developer or 20 liters regenerator)  
9.960.44.35.02

## X-Ray Developer „G135“

liquid concentrate, for machine processing  
tank with 2 x 5 liters, for 40 liters developer  
9.960.61.35.02

## X-Ray Starter solution „G135S“

1 liter tin  
9.960.62.35.02

## Rush Fixer Concentrate „G335“

2 x 5 l liquid concentrate, incl hardener  
for 2 x 20 liters of fixer solution  
(for machine processing )  
9.960.47.35.02

## Rush Fixing Bath „G328“

liquid, 5 l for 25 l solution,  
for manual processing  
9.963.88.35.02

## Agepon Wetting Agent

1,000 cbm  
9.960.60.35.02

## Algezid II anti algae agent

liquid, 1 l bottle  
9.966.39.35.02

**STRUCTURIX** Thio-test reagent  
9.966.41.35.02

**STRUCTURIX** Thio-test color wedge  
9.966.42.35.02

## STRUCTURIX PMC-strips D4

50 sheet, format 6 x 24 cm  
not certified  
9.966.43.35.02  
25 sheet, format 6 x 24 cm, certified  
9.966.43.35A02

## Processor clean up film

pack of 100sheet format 35x43cm  
9.964.46.35.02

## Fixclean cleaner

for fixer and water tanks,  
liquid, 5 l container  
9.966.40.35.02

## Devclean cleaner

for developer tanks,  
liquid, 2 x 5 l container  
9.964.53.35.02

## Bic Ebaren 86

Developer tank cleaner + neutralizer  
pack incl. 2x435g cleaner + 2x440g  
neutralizer for 20l solution  
9.966.49.35.02

## Bic Fixaren 80

Fixer tank cleaner, pack with  
4x510g for 10l solution  
9.966.56.35.02

## Argalex 91

Water tank cleaner, pack with  
2x2.5l cleaner and 12kg neutralizer  
for 10l solution  
9.966.50.35.02

## TETENAL machine developer

Roentoroll 25 for 12 x 2.5 l solution  
9.968.18.33.09

## TETENAL machine fixer

Superfix 25 for 12 x 2.5 l solution  
incl. hardener  
9.968.19.33.09

## TETENAL machine developer

Roentoroll HC for 2 x 20 l solution  
9.966.18.35.06

## TETENAL machine fixer

Superfix MRP for 2 x 20 l solution  
9.966.19.35.06

## TETENAL water tank cleaner

for 5 x 15 l  
9.966.21.35.06

## TETENAL UNIVERSAL

for 7 x 15 liters cleaner  
9.964.48.35.06

## X-Ray Films

SEIFERT supplies a complete assortment of industrial X-ray  
films in various dimensions and speeds, such as:

### Darkroom packaging FW and NIF

Folder wrapped (with paper folds)  
Non Interleaved Film (without interleaved paper)

### Daylight wrapped DW (without lead screens)

Daylight wrapped Pb  
In ready for use individual packing with lead screens

### VACUPAC

Light-proof, moisture-proof, and air-tight individual plastic  
packing with lead screens

### ROLLPAC DW and Pb

Roll films of 90m length in typical width of 60,70 and 100mm;  
available in daylight wrapping with and w/o lead screens



**SEIFERT**  
X-Ray Technology

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Represented by



**RICH. SEIFERT & CO.** GmbH & Co. KG  
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