The TipSet timer, heart of the system, is a computerized unit equipped with flat keyboard and digital display for full control of X-ray generation. Designed for ease of use, precision and reliability, it grants dose accuracy and reproducibility even in the most demanding working conditions. It features automatic setting of technique factors in mAs through object-programmed selection according to tooth type and patient size, basing on sensitivities declared for digital sensor and type of film to be used in the practice. Manual override of set up parameters is possible whenever necessary. Other features include real time controls for dose consistency, cool down procedure for minimum waiting time, improved safety with back-up timer and X-ray cut-off with "dead-man" functionality on control switch.

The Sharpest Images Delivered
IntraOs DG is an innovative dental X-ray equipment which meets the most stringent imaging requirements in the dental field, both when using high resolution digital receptors or finest grain films. The best results can be achieved when in combination with digital sensors, the full imaging potential of which, powered by image processing and manipulation, can be exploited without compromises. The joint use of extra fine focus (XFF) generators and high resolution digital sensors is actually setting a new imaging standard with highly defined images and with great diagnostic power. The very small focal spot of the X-ray insert, the beam limiting device with effective near focus collimation and the penetration power of the 70 kV radiation beam constitute the best combination of elements to get sharp images with good radiographic contrast and optimum detail perception.

Paralleling Techniques
The adoption of sensor holders for paralleling techniques, where anatomical details can be up to one inch from the receptor, further increases the importance of the XFF generators for finest results.
Crisp and Clean Images

IntraOs DG
DEntAl X-rAy EQUIPMEnT

mAs
The technique factor current-time product in mAs (anode current by exposure time) allows for a more general representation of the working conditions and make it easier the comparison with other generators having different value of anode current.

Low Dose
Important feature of the system is the wide latitude of exposure given by the anode voltage potential of 70 kV over a range of technique factors from 0.21 to 11.2 mAs, which allows to cover the needs of low dose sensors and of traditional films. High care is devoted to neutralization of soft radiation by filtration in compliance to quality requirements, till to the right hardness of radiation for high contrast rendering.

XFF Generator
Diagnostic imaging relies on extra fine focus (XFF) generators to fully exploit the resolution power delivered by first class receptors.

Configurations
The system configurations include wall mounted solutions with short, medium, or long extension arm and mobile. The folding arm in aluminum casting is solid and stable, features of utmost importance for precise positioning without drift and fluctuations. A beam collimator with rectangular section is available for dose reduction.

Well defined image*

Part of radiograph made with IntraOs DG, XFF generator, 0.4 focal spot.

Less defined image

Part of radiograph of same object made with high frequency unit, DC generator, 0.7 focal spot.

(*) Actual image quality may be spoiled due to printing limitations.
TECHNICAL DATA

Tube Head
- Focal Spot: 0.4 IEC 336/1993
- Mains Voltage: 120/230 VAC, 50/60 Hz
- High Voltage Potential: 70 kVp
- Anodic Current: 3.5 mA
- Inherent Filtration: 2.5 mm Al
- Focus Skin Distance: 21 cm
- Output Radiation Field: Round 6 cm, Rectangular 3.5x4.6 cm
- Coaxial connector for free horizontal rotation
- Weight: 6.5 kg

Mechanical Support System
The wall mounted support system includes:
- Wall support (12 cm width, 24 cm height, 9 cm depth)
- 30, 60, and 80 cm extension arms
- Folding arm; useful reach of:
  - 138 cm with 30 cm extension arm
  - 168 cm with 60 cm extension arm
  - 188 cm with 80 cm extension arm

The mobile support is composed of:
- Mobile stand (74 cm width, 112 cm height, 62 cm depth)
- Folding Arm (73 cm height)

Timer TipSet in mAs
- Mains: 115/230 VAC, 50/60 Hz
- Microprocessor controlled functionality
- Sensitivity setting for digital receptor and film
- Automatic setting of technique factors by object selection or manual mode
- Technique factors in mAs from 0.21 to 11.2 (18 steps R10 scale)
- Zero-crossing power switching
- Dose consistency (accuracy and reproducibility)
- Inhibition of effects of mains fluctuations selectable on request
- Back-up timer
- Hand-switch with 3 m coiled cord
- Timer and/or hand-switch can be remotely mounted
- Dimensions: 15 cm width, 24 cm height, 9 cm depth