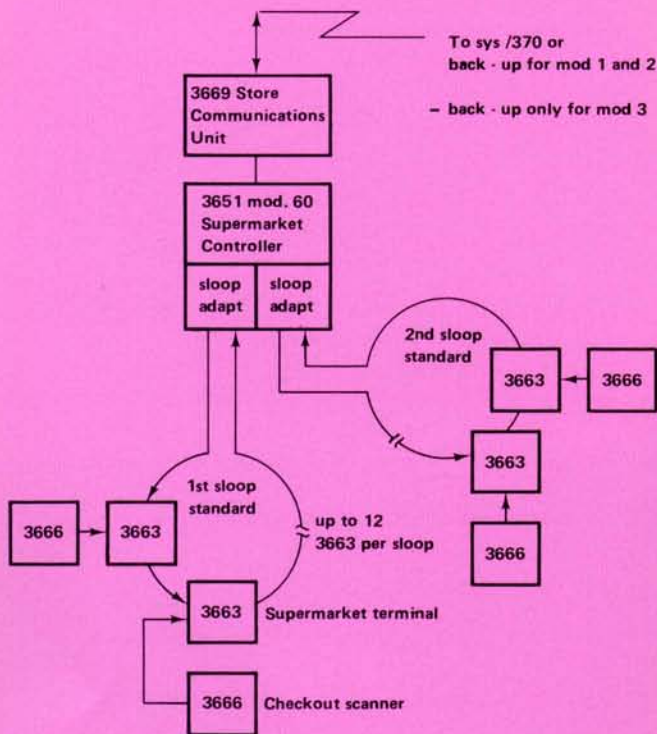


# 3660

Supermarket System





### 3660 Supermarket Store System Description

The IBM 3660 Supermarket System is designed to meet the needs of the supermarket industry in the areas of customer service, sales efficiency and transaction accounting.

The system consists of the following machines:

- 3651 Model 60/Supermarket Controller
- 3663 Supermarket Terminal
  - Model 1 - Station and Control
  - Model 2 - Station only
- 3666 Checkout Scanner
- 3669 Store Communications Unit
  - Model 1 - Switched Line Unit (Canada)
  - Model 2 - Caducee Line Unit (France)
  - Model 3 - Non-switched Line

The system devices are located throughout the supermarket.

The 3651 Mod 60 Supermarket Controller would normally be placed in the back room or store manager's office. 3663 Supermarket Terminals and 3666 Checkout Scanners would be placed at each of the checkout lanes.

The 3651 Mod 60 Store Controller communicates with the Host CPU via a 3669 Communications Unit or 3976-3 or PTT Mandatory Modem according to Country. The 3666 Checkout Scanner attaches to the 3663 Supermarket Terminal. The 3663 Terminals communicate with the 3651 Mod 60 Supermarket Controller via a SLOOP (Store Loop).

The Store Loop is a serial method of connecting terminals that allows several maintenance features. If an individual terminal detects an error, it proceeds through a self-diagnosis routine, displays an error code to the operator and energizes bypass circuitry to permit the rest of the SLOOP to function. If the SLOOP itself fails, the terminal that is downstream of the failure transmits a code to the control unit, indicating the point of failure. Intermittent errors on the terminals and the SLOOP are recorded on a disk at the 3651 Mod 60 Supermarket Controller.

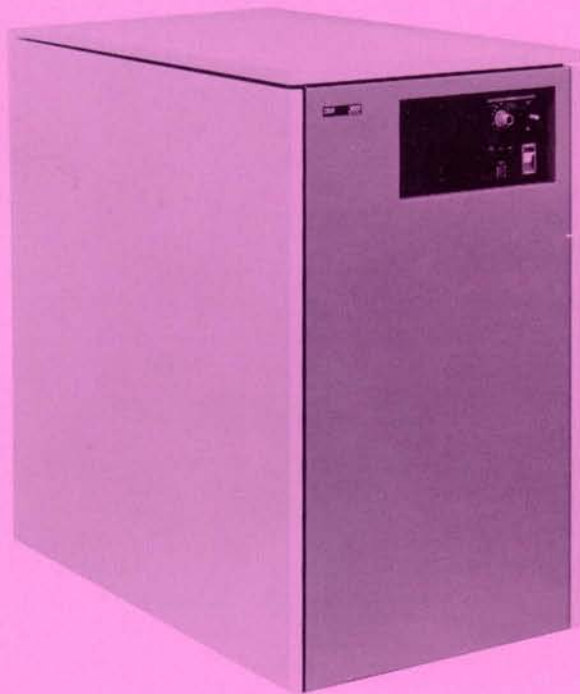
If the 3651 Mod 60 is inoperative or line problems to the Host occur, the Store Loop (SLOOP) may be linked to a "sister" store 3651 Mod 60 via the 3669 for backup operation.

### *3651 Description*

The 3651 Supermarket Controller directs the flow of data throughout the store. Communication with the Host CPU is via 3669 Store Communication Unit, or 3976-3 or PTT Mandatory Modem according to Country. Communications with the store's terminals is via SLOOP (Store Loop) adapter. There are two SLOOP's per 3651. Each of these adapters is capable of handling up to twelve 3663 Stations.

### *Serviceability/Maintenance Features*

- Maintenance Analysis Procedures (MAP's) designed to isolate
- Problem Determination Procedures (PDP's) assist the customer in isolating failures.
- Hardware Bring-up Tests.
- In Line Diagnostics.
- Error Logging.
- CE/Operator Panel.
- Automatic Diagnosis of SLOOP failures.



### *3663 Description*

The IBM 3663 Supermarket Terminal Model 1 consists of a keyboard, printer, display, cash drawer and a control segment.

The 3663 Model 2 consists of the keyboard, printer, display and cash drawer, that share a common control segment of the Model 1. Connection to the 3651 Mod 60 Controller is via one of two standard SLOOP's (Store Loops). Up to twelve 3663 Stations may be connected on a single SLOOP.

The 3663 is packaged such that the various I/O units may be arranged separately (distributed) or as a single assembly (integrated) as shown in the picture.

As an option, the 3663 may contain adapters for connecting OEM supplied stamp dispensers, coin dispensers or scale. An adapter to connect the 3666 checkout scanner is also provided.



### **3663 Maintenance/Features**

- Maintenance Analysis Procedures (MAP's) designed to isolate to the failing FRU with a high degree of effectiveness.
- Error Logging of detected errors at the Store Controller.
- Self-diagnosis and automatic display of error codes during power-on sequence.
- Problem Determination Procedures (PDP's) – Operator oriented In-Line Diagnostics.

### **3666 Description**

The IBM 3666 Checkout Scanner is an optical recognition device designed to increase the throughput of checkout.

Supermarket merchandise will have an identification label that is preprinted with a bar code symbol which is readable by the 3666.

Label recognition is accomplished with a low power laser beam that scans each label, projecting light on the bar code and collecting the reflected images. The information is then transmitted to the 3651 Supermarket Controller through the 3663. The 3666 eliminates the need for most of the manual key entry of item sale information.

### **Program Support**

The 3660 Supermarket System will be Host program supported by DOS/VS or OS/VS with BTAM using BSC through the 3704 or 3705 in EP control mode.

The Sub-system Support Services operate in the Host System 370 processor and provide facilities for:

- A. Creating the characteristic 3660 Supermarket System functions.
- B. Transmission of the 3660 Supermarket System functions to the 3651 Model 60.
- C. Maintenance of the 3660 Supermarket System functions.

The 3660 Supermarket System programs will be supported by a PSR at the Host location.

### **System Serviceability**

- Problem Determination Procedures (PDP's) - Customer oriented.
- Maintenance Analysis Procedures (MAP's).
- In-Line Diagnostics.
- Communications devices wrap tests.
- General logic probe.
- CE Indicator Card.
- No scheduled P.M.
- Error Log.

### **System Reliability**

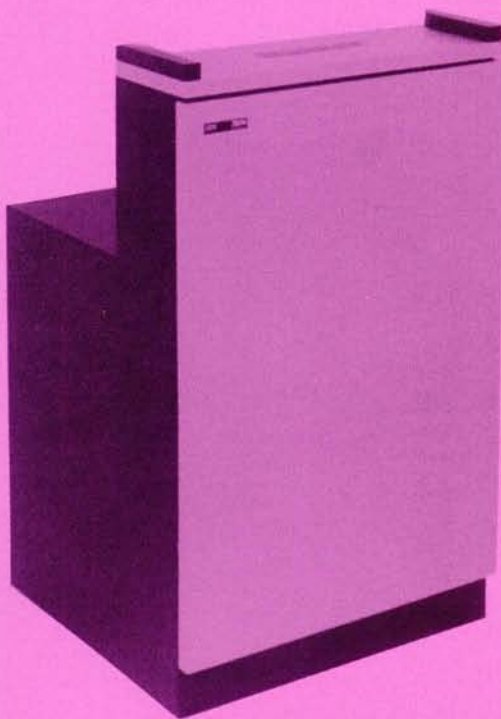
- Minimum moving parts.
- Non-mechanical keyboard.
- Soft error recovery.

### **System Technologies**

- Field Effect Transistor (FET).
- Transistor Transistor Logic (TTL).

### **CE Career Path**

The 3660 Supermarket System components are "Data Recording" CE career path products.



#### *Serviceability/Maintenance Features*

- Manual backup from keyboard.
- Maintenance Analysis Procedures (MAP's) designed to isolate to the failing FRU with a high degree of effectiveness.
- Problem Determination Procedures (PDP's) — Customer oriented.
- In-Line Diagnostics.
- Error Logging at the Controller.

#### *3669 Description*

The IBM 3669 Store Communication Unit is a stand-alone device that allows data transmission at 2400 bps. It is available in three models:

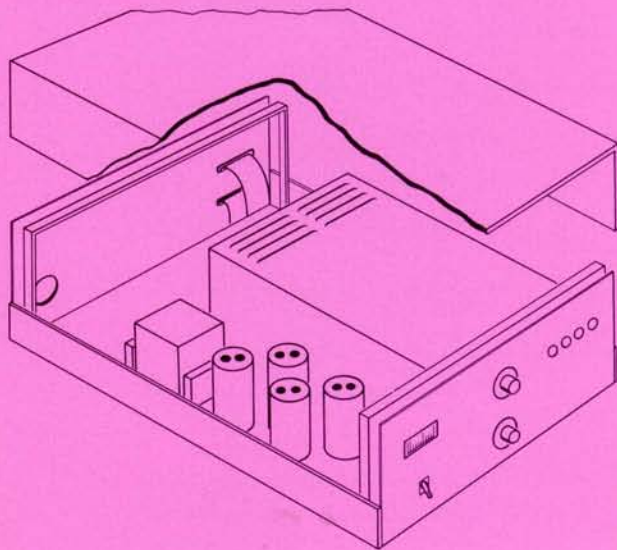
- Model 1 - Public Switched Network for Canada.
- Model 2 - Caducee Network for France.
- Model 3 - Non-Switched Network.

Mod. 1 and 2 are used to communicate to the Host CPU or to provide backup by allowing store terminals to be controlled by a remote 3651 Mod 60 when the primary 3651 Mod 60 is not available for operation.

Mod. 3 may be used only for back-up on non-switched lines. Communication to the Host can be done with 3976-3 or PTT Mandatory Modem according to Country.

#### *Serviceability/Maintenance Features*

- Maintenance Analysis Procedures (MAP's) designed to isolate to the failing FRU with a high degree of effectiveness.
- Automatic wrap tests resident in the 3651 Mod 60.
- Manual wrap tests.
- Signal quality meter.
- Indicator panel.



**IBM World Trade Corporation  
DP Customer Engineering  
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New York, N.Y. 10017 U.S.A.**

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