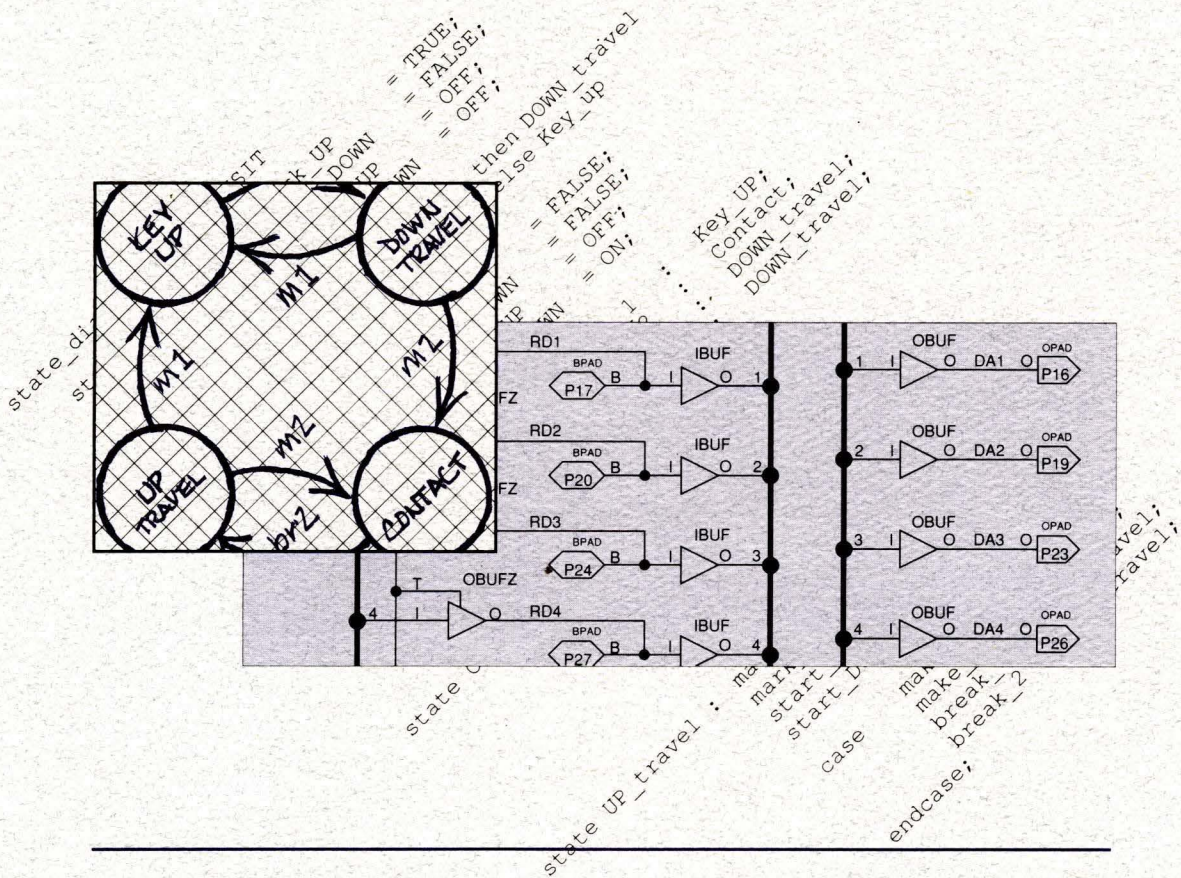


# Logic Diagram Package





# Logic Diagram Package

September 1990

981-0251-001

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# Preface

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## Technical Questions?

If you need technical assistance with your Data I/O product, our Customer Resource Center (CRC) Support Engineers are available between 6:00 AM and 5:00 PM Pacific Standard Time. To help us provide quick and accurate assistance, please be at your programmer or computer when you call, and have the following ready:

- Product version number
- Product serial number (if available)
- Detailed description of the problem you are experiencing
- Error messages (if any)
- Device manufacturer and part number (if device-related)
- Product manual

### USA and Canada

800 247-5700  
Fax: 206 882-1043

### International

Data I/O Japan 03 432-6991

Data I/O Europe +31 (0)20 6622866

Data I/O  
Intercontinental 206 881-6444

### Written Inquiries

Data I/O Corporation  
10525 Willows Rd N.E.  
P.O. Box 97046  
Redmond, WA 98073-9746 USA



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## Customer Support BBS

You can also call Data I/O's Customer Support Bulletin Board System (BBS). From the Customer Support BBS you can obtain a wide range of information on Data I/O products, including current product information, new revision information, known bugs (and work-arounds), helpful application notes, and other miscellaneous information. In addition, the BBS has a collection of DOS utilities you can download.

The Customer Support BBS also has a message facility which allows you to leave messages for Customer Support Personnel. For example, you could request support for a specific device, or suggest how we can improve our products. Or you could leave a message telling us what you think of Data I/O product(s).

To learn more about the Data I/O Customer Support BBS, call it at 206 882-3211. The protocol is 1200/2400/9600 (Courier HST) baud, 8 data bits, 1 stop bit, and no parity. Online help files are available throughout the BBS to help you learn more about the BBS.

---

## End User Registration and Address Change

If your address has changed since you filled out your Warranty Registration Card, please notify your nearest Data I/O representative. This ensures that you receive information about product enhancements. Be sure to include the product serial number, if available.

---

## Warranty Information

### Description

Data I/O Corporation warrants its products against defects in materials and workmanship for a period of ninety (90) days for software and one (1) year for hardware unless specified otherwise. The warranty begins when the product is shipped.

### Warranty Service

Data I/O maintains customer support centers throughout the world, each staffed with factory-trained technicians to provide prompt, quality service.

For warranty service, contact your nearest Data I/O Customer Support Center. If you do not have a name or phone number for your nearest office, refer to the list of Data I/O offices below.

**United States**  
**Data I/O Corporation**  
**Customer Resource Center**  
10525 Willows Road N.E.  
P.O. Box 97046  
Redmond, WA 98073-9746  
Telephone: 800 247-5700  
Fax: 206 882-1043  
Telex: 152167

**Data I/O San Jose**  
1701 Fox Drive  
San Jose, CA 95131  
Telephone: 408 437-9600  
Fax: 408 437-1218

**Data I/O New Hampshire**  
20 Cotton Road  
Nashua, NH 03063  
Telephone: 603 889-8511  
800 858-5803 (NJ & NY only)  
Fax: 603 880-0697

**Data I/O Intercontinental**  
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Fax: 206 882-1043  
Telex: 4740166

**Data I/O Japan**  
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Higashishinbashi Bldg. 8F  
2-1-7, Higashi-Shinbashi  
Minato-Ku, Tokyo 105, Japan  
Telephone: 03 432-6991  
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**Data I/O Canada**  
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L4V 1V2 Canada  
Telephone: 416 678-0761  
Fax: 416 678-7306

**Data I/O-Instrumatic Electronic**  
**Systems Vertriebs GmbH**  
Lochhammer Schlag 5a  
D-8032 Gräfelfing  
West Germany  
Telephone: 089 858580  
Fax: 089 8585810

**Data I/O Europe**  
World Trade Center  
Strawinskylaan 633  
1077 XX Amsterdam,  
The Netherlands  
Telephone: +31 (0)20 6622866  
Fax: +31 (0)20 6624427  
Telex: 16616 DATIO NL

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## Data I/O Update Service

Data I/O Customer Support is committed to providing you with the support programs you need to keep your Data I/O products in optimum operating condition and up to date with the latest, state-of-the-art capabilities.

For more information, or to order a Service Agreement or Update Agreement, call your nearest Data I/O representative. The name and phone number of your nearest Data I/O office can be found in the Warranty Service section of this chapter.

---

## Data I/O Device Support Policy/Liability

1. Data I/O strives to achieve more device support approvals from semiconductor manufacturers than any other programmer manufacturer or software developer.
2. Every effort is made to program an adequate number of samples according to the manufacturer-supplied specification, and verify waveforms as per that specification prior to release of support. Manufacturers' approvals are to be sought in parallel with this process.
3. Data I/O's objective is to seek and obtain approvals on all devices.
4. Data I/O has made every attempt to ensure that the device information (as provided by the device manufacturer) contained in our programmers, software and documentation is accurate and complete. However, Data I/O assumes no liability for errors, or for any damages, whether direct, indirect, consequential or incidental, that result from use of documents provided with equipment, or from the equipment or software which it accompanies, regardless of whether or not Data I/O has been advised of the possibility of such loss or damage.

---

## Logic Diagram Conventions

The logic diagrams describe the architecture of the programmable logic device. Fuse numbers and node numbers have been added to the logic diagrams. Each fuse is represented by the intersection of an input line (vertical) and a product term line (horizontal). The fuses of the logic device are numbered, and the number of a given fuse in the diagram can be found as follows:

1. Locate the fuse intersection in the logic diagram.
2. Follow the product term line from that intersection to its left and read the first fuse number for the row.
3. Follow the input line from the fuse intersection to either the top or bottom end and read the increment number.

**17**

or = pin number

17 —

**48** — = node number

1024 — = first fuse number (at left of diagram)

14 = increment number (at top and bottom of diagram)  
|

4. Compute the fuse number by adding the first fuse number and the increment number.



---

## About the Logic Diagram Package

This package is a compilation of all the logic diagrams available at the time of printing. The diagrams are based on manufacturers data and have been modified to show fuse numbers and node numbers that are useful when using the following Data I/O products:

ABEL™  
GATES™  
PLDtest®  
PLDtest Plus™  
PLD-CADAT

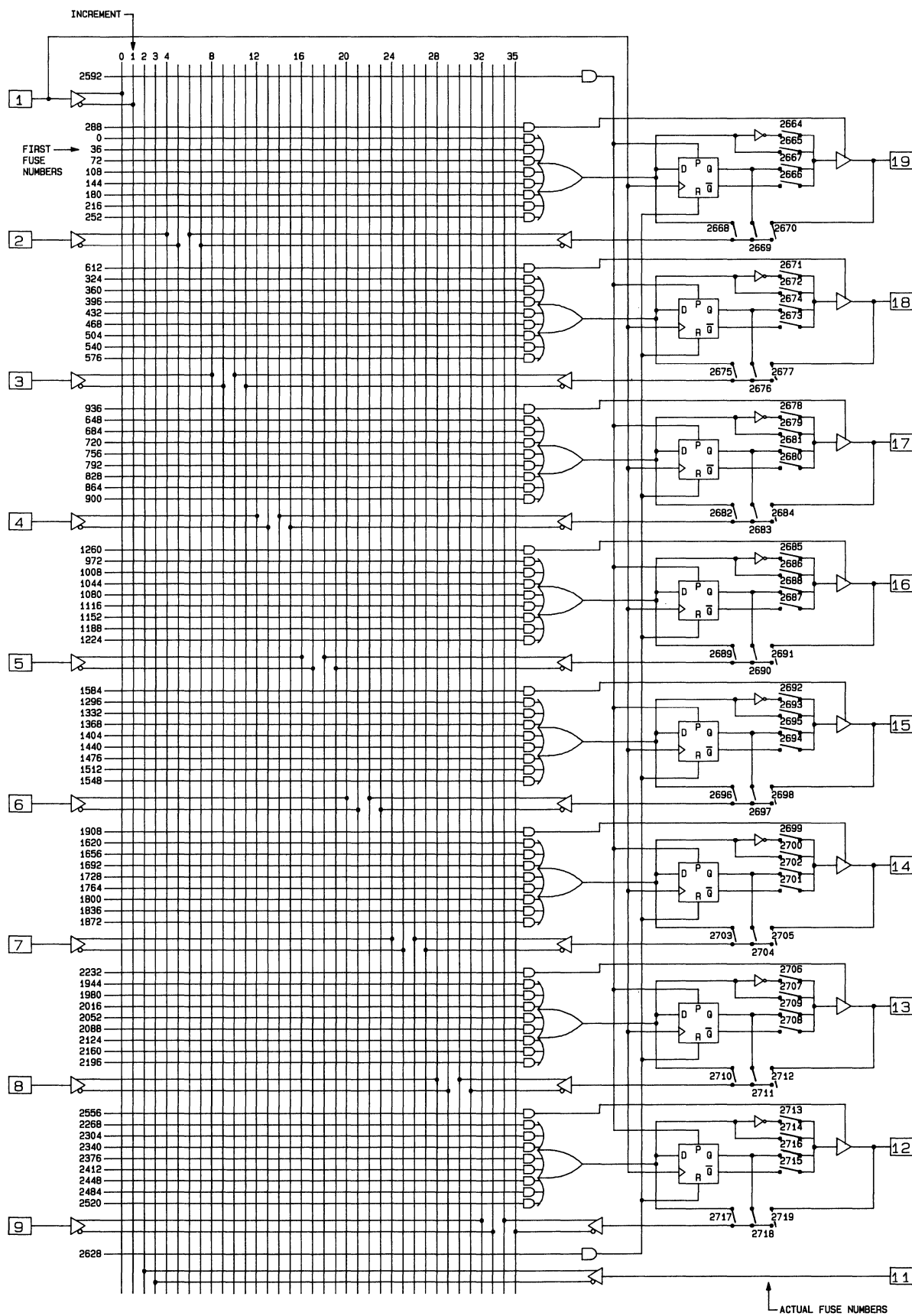
Some of the products listed above do not support all of the programmable logic devices described in these logic diagrams, while others support devices not described within these pages. Every reasonable effort has been made to ensure the completeness and accuracy of these diagrams. However, Data I/O does not guarantee that these diagrams are, in fact, complete and accurate in every detail.

For each product, the supported devices are either in a printed list, or can be accessed using a software utility (for example, finddev4 for ABEL).

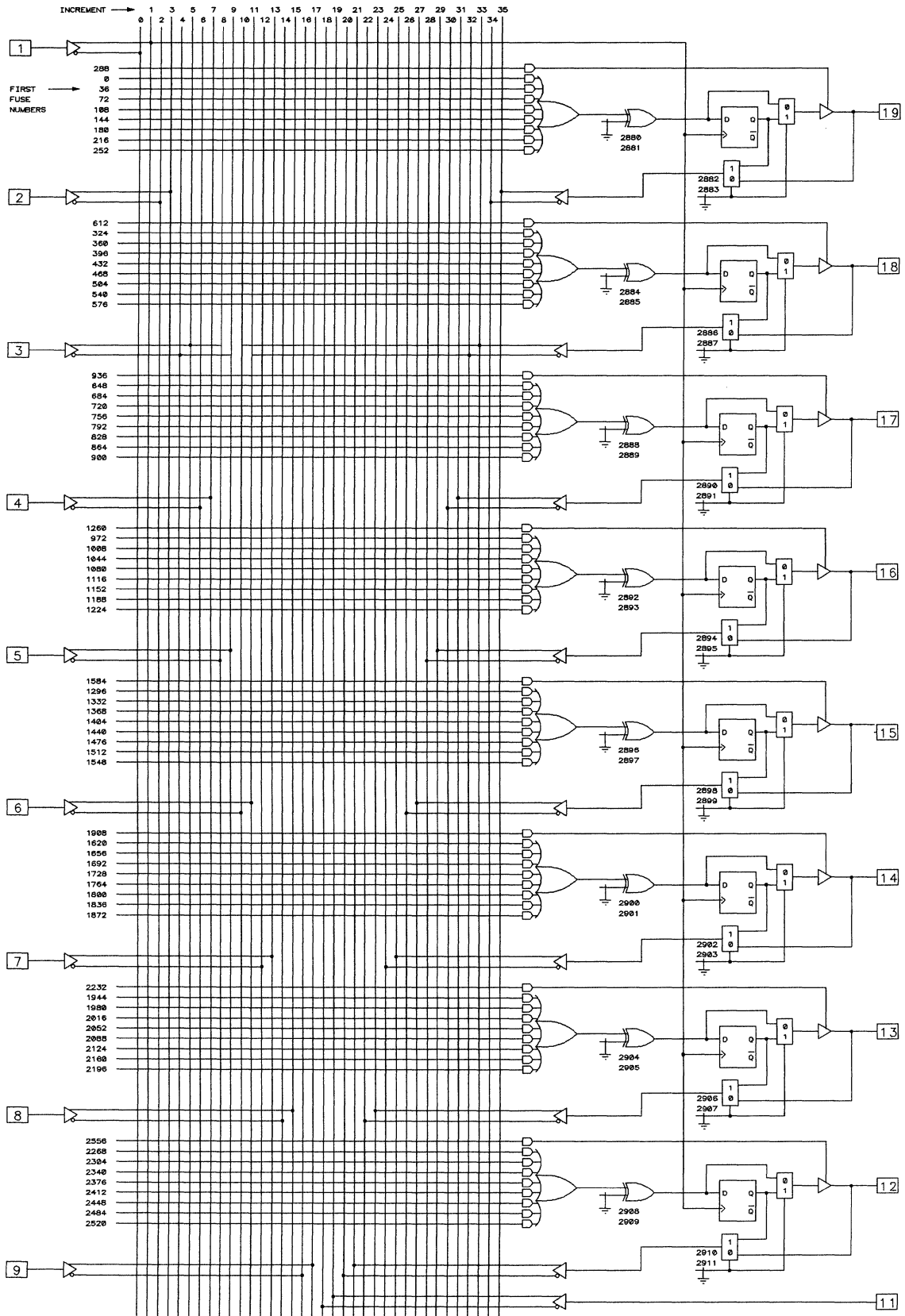
The *Data I/O Reference Chart of Programmable Devices* provides a cross-reference between manufacturer's device names and the device filenames used by Data I/O. Annual subscriptions are available by contacting your Data I/O representative and ordering REFCHART.



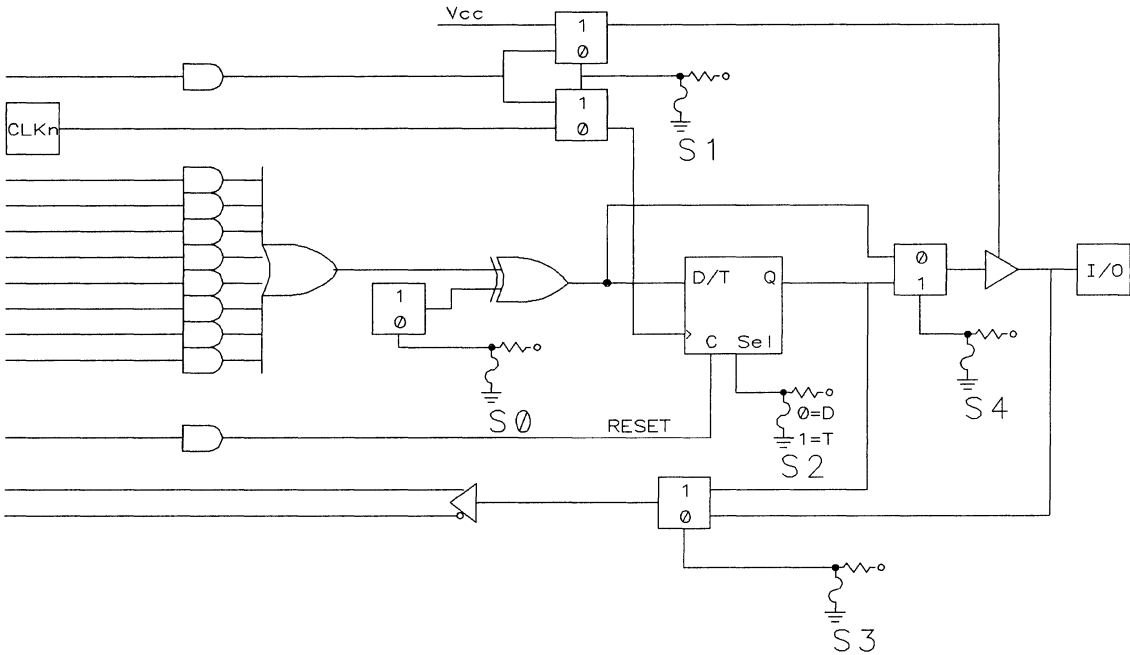
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NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT



- NOTES:
1. REFERENCE ARRAY = 2892 - 2879 ALWAYS SET TO JEDEC ~'1'
  2. MISER-MODE (TM) = 2912 - 2913; A JEDEC ~'0' ENABLES THIS MODE
  3. TURBO-BIT (TM) = 2914 - 2915; A JEDEC ~'1' ENABLES THIS MODE
  4. ALL FUSES LISTED AS PAIRS SHOULD BE SET TO THE SAME STATE.

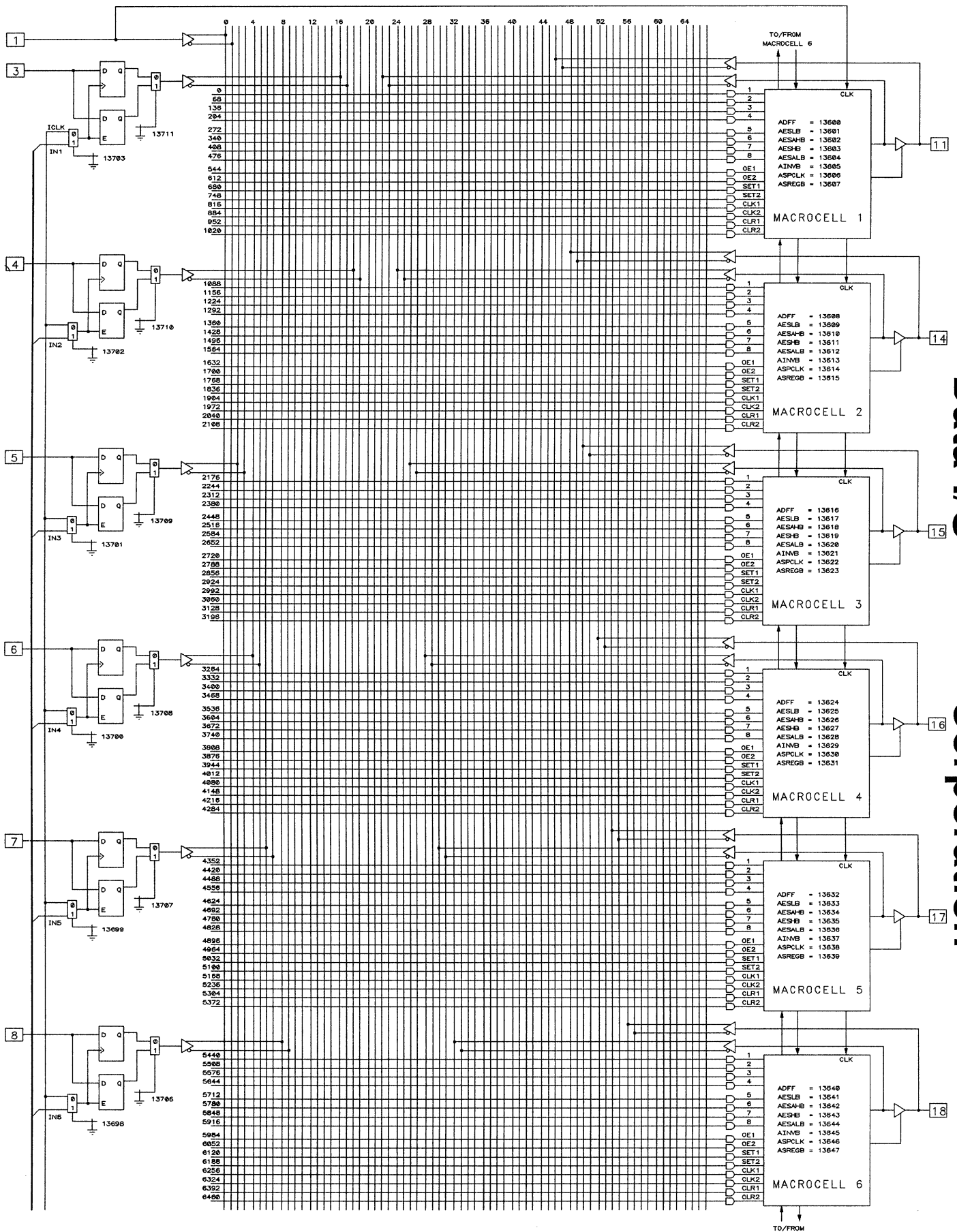


	E0600	E0900
Main Array Size	160 x 40	240 x 72
Fuse Numbers	0 - 6399	0 - 17279
Architecture Array	16 x 5	24 x 5
Fuse Numbers	6400 - 6479	17280 - 17399
Turbo Fuses	6480, 6481	17400, 17401

E600	CLKn
Pins 3-10	1
Pins 15-22	13

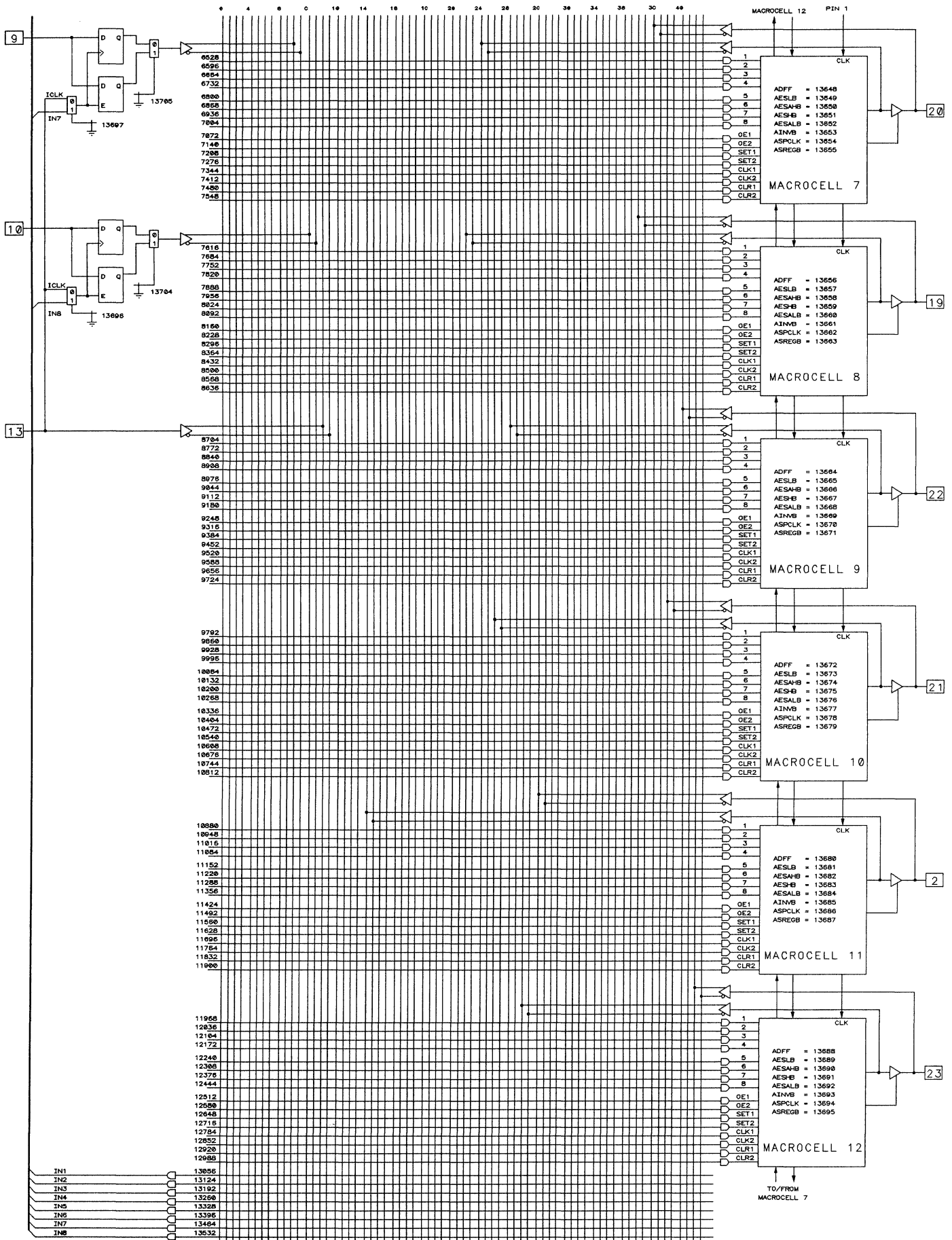
E900	CLKn
Pins 5-16	1
Pins 25-36	21

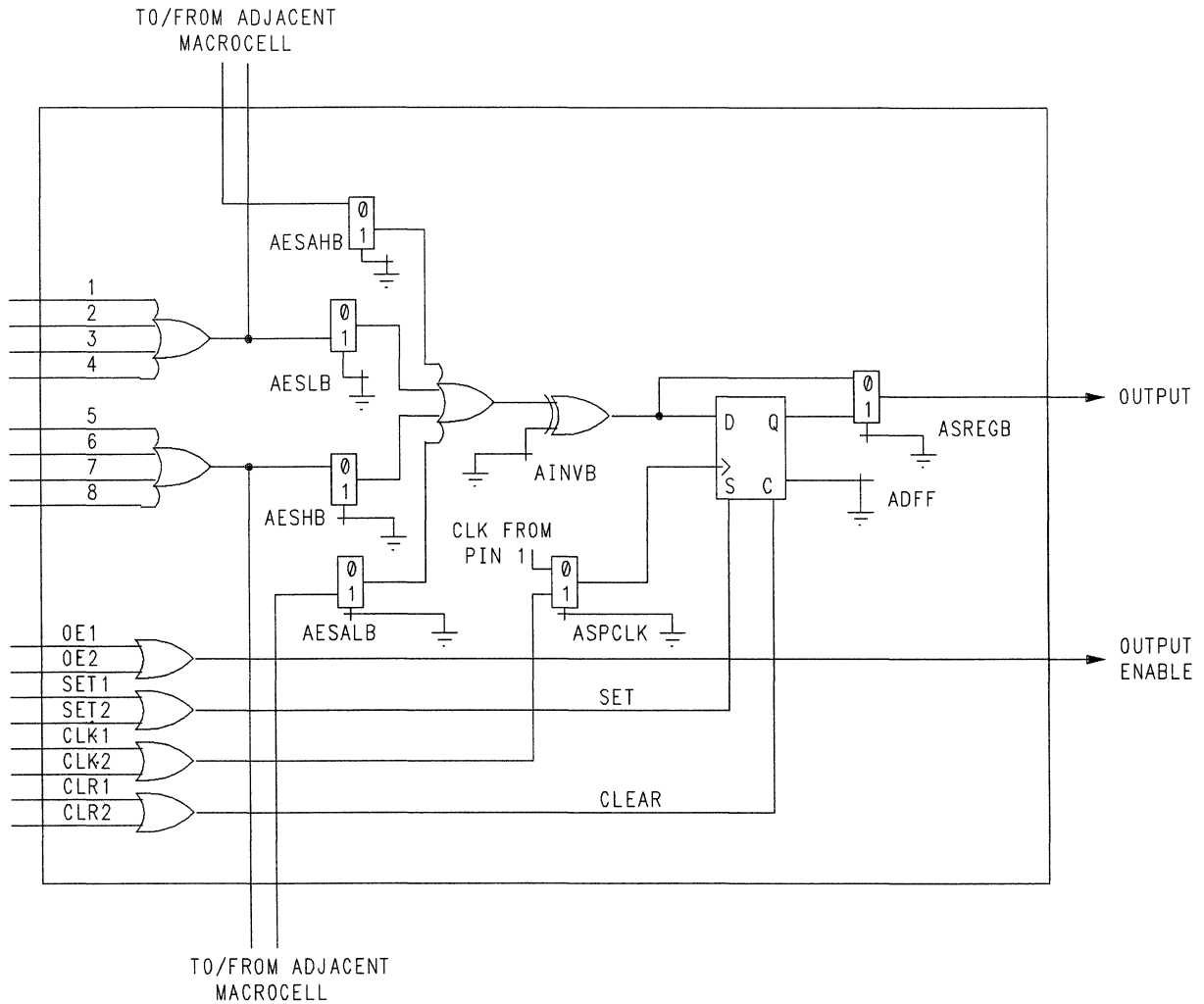
E0600/E0900 Output Macro-Cell Diagram



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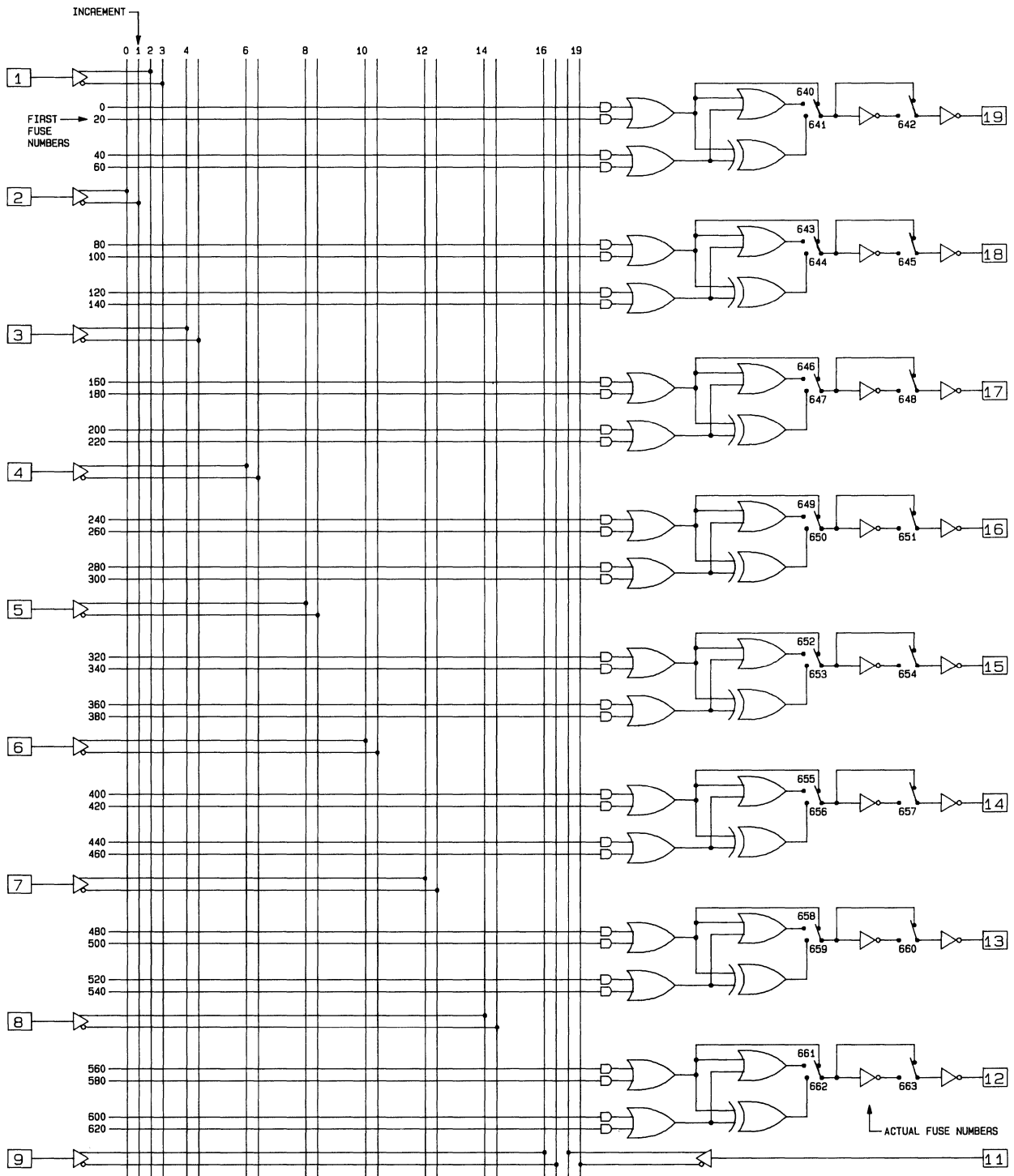
Corporation  
Data I/O



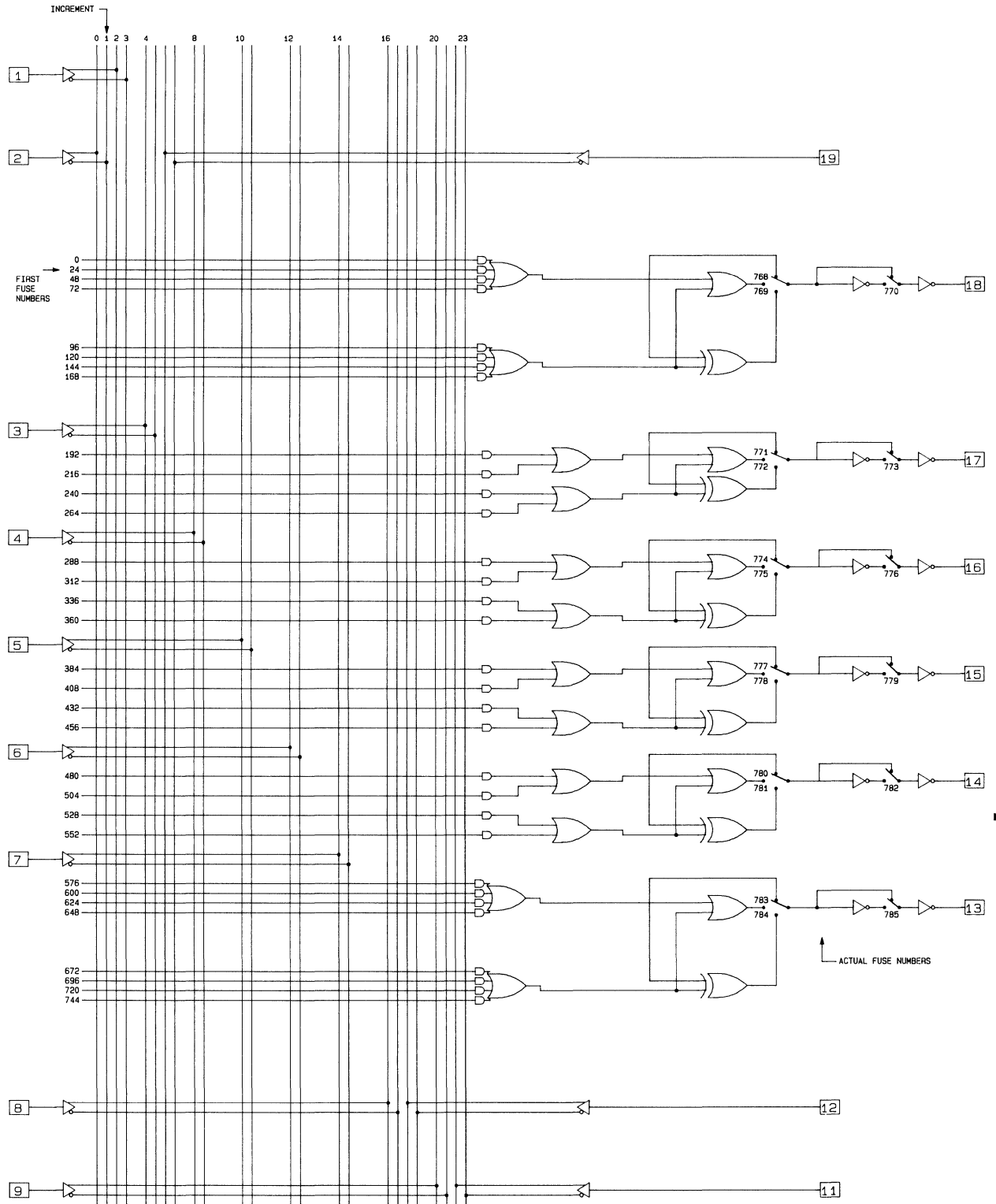




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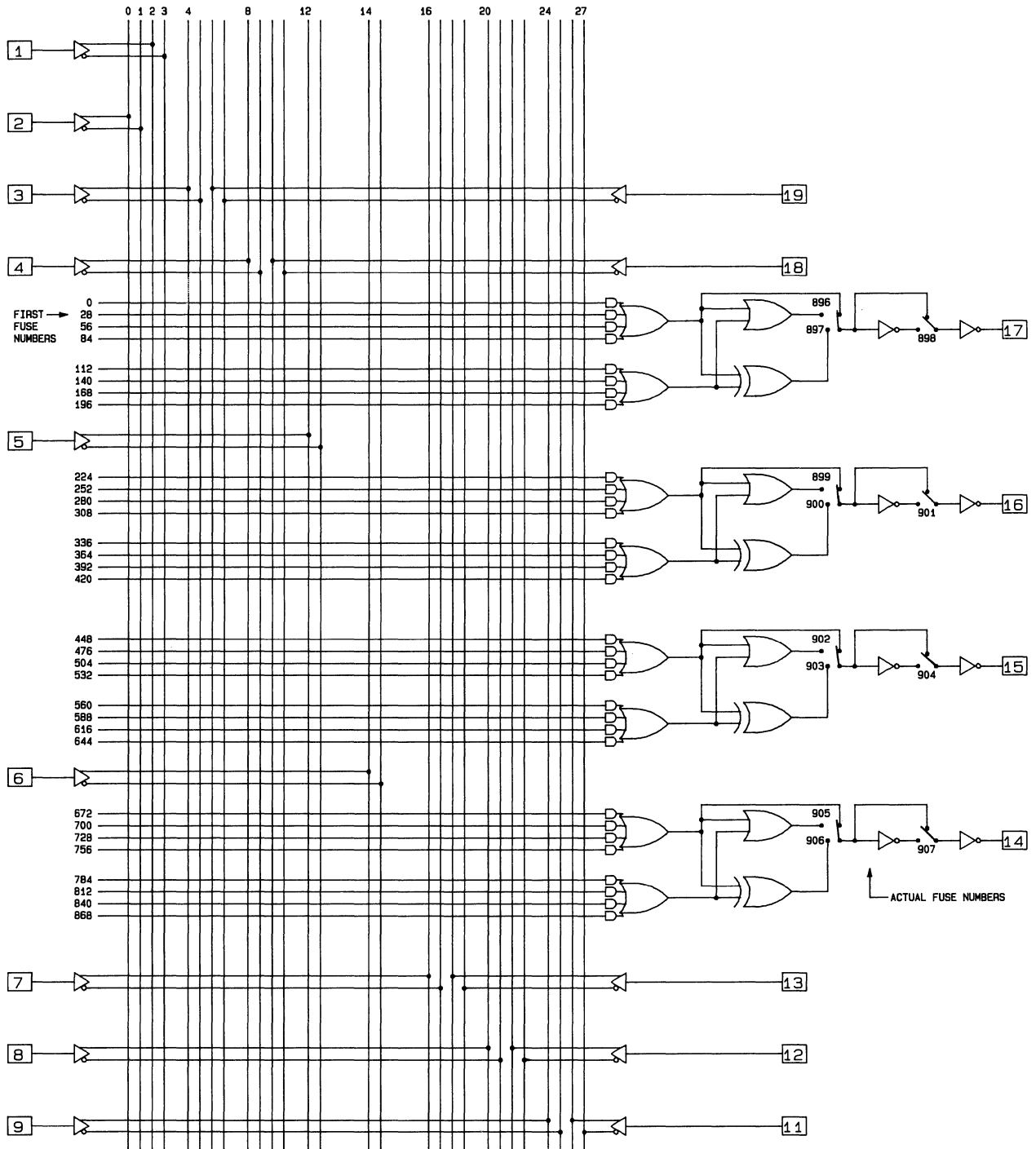
NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT



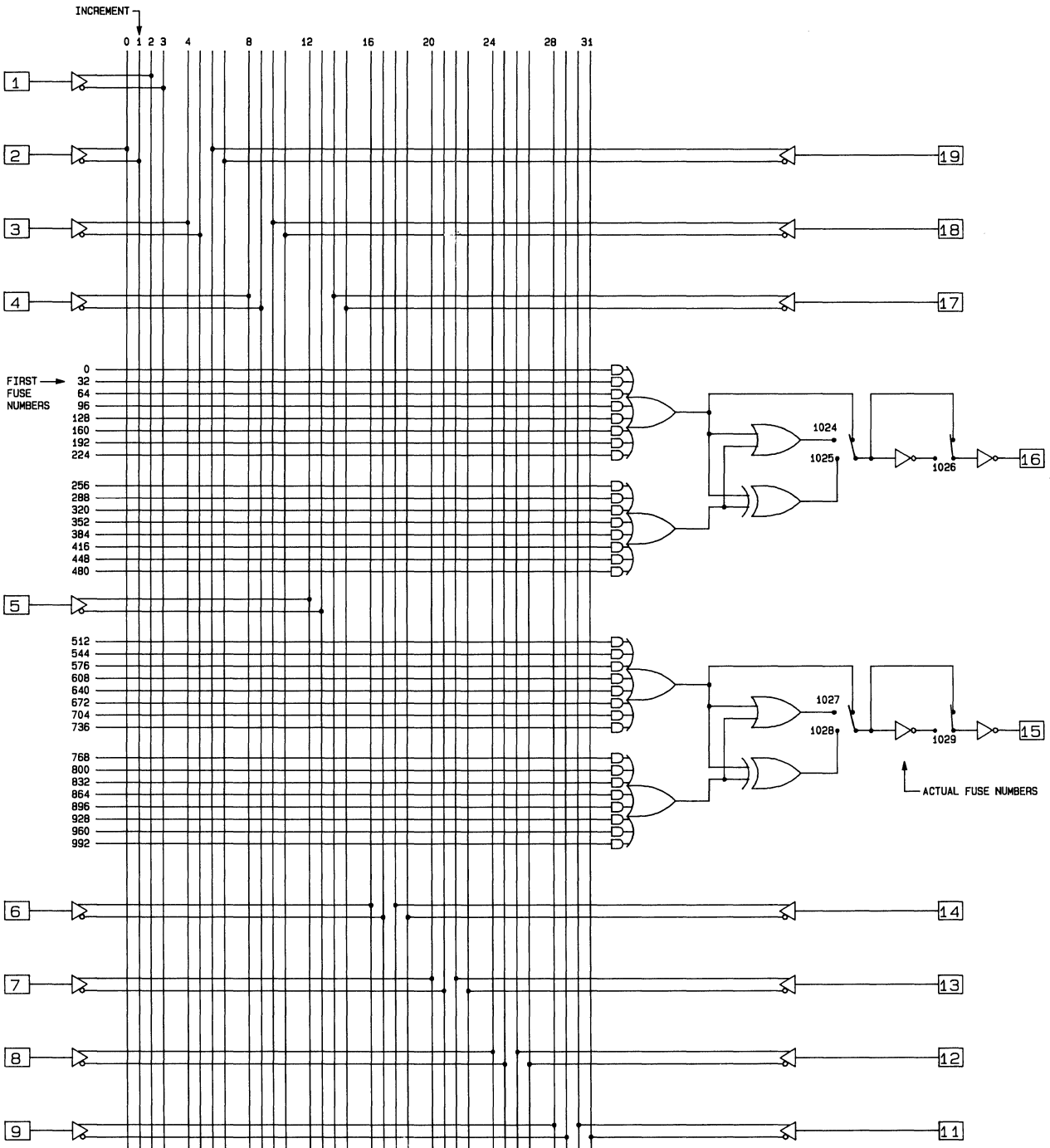
NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

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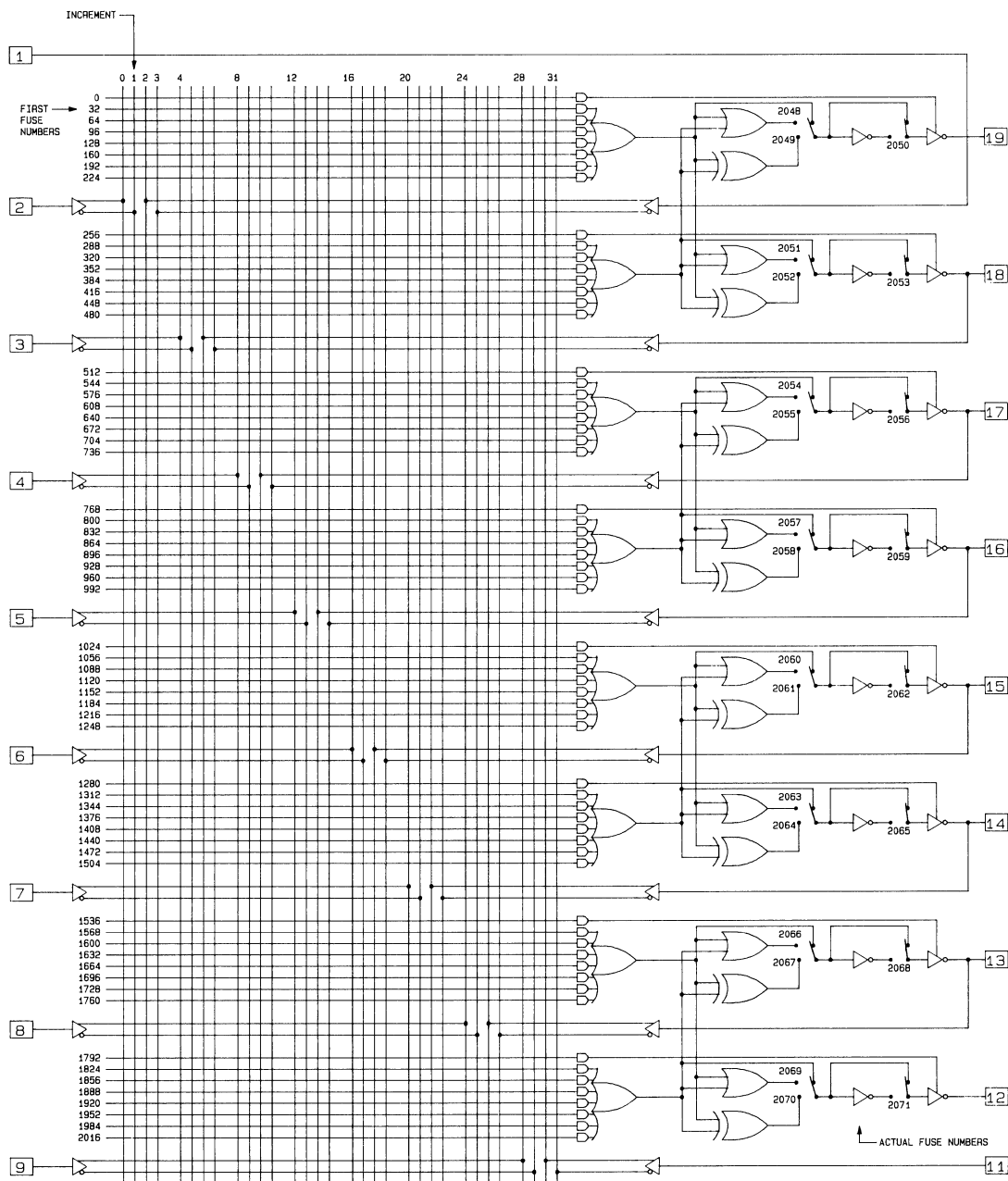


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

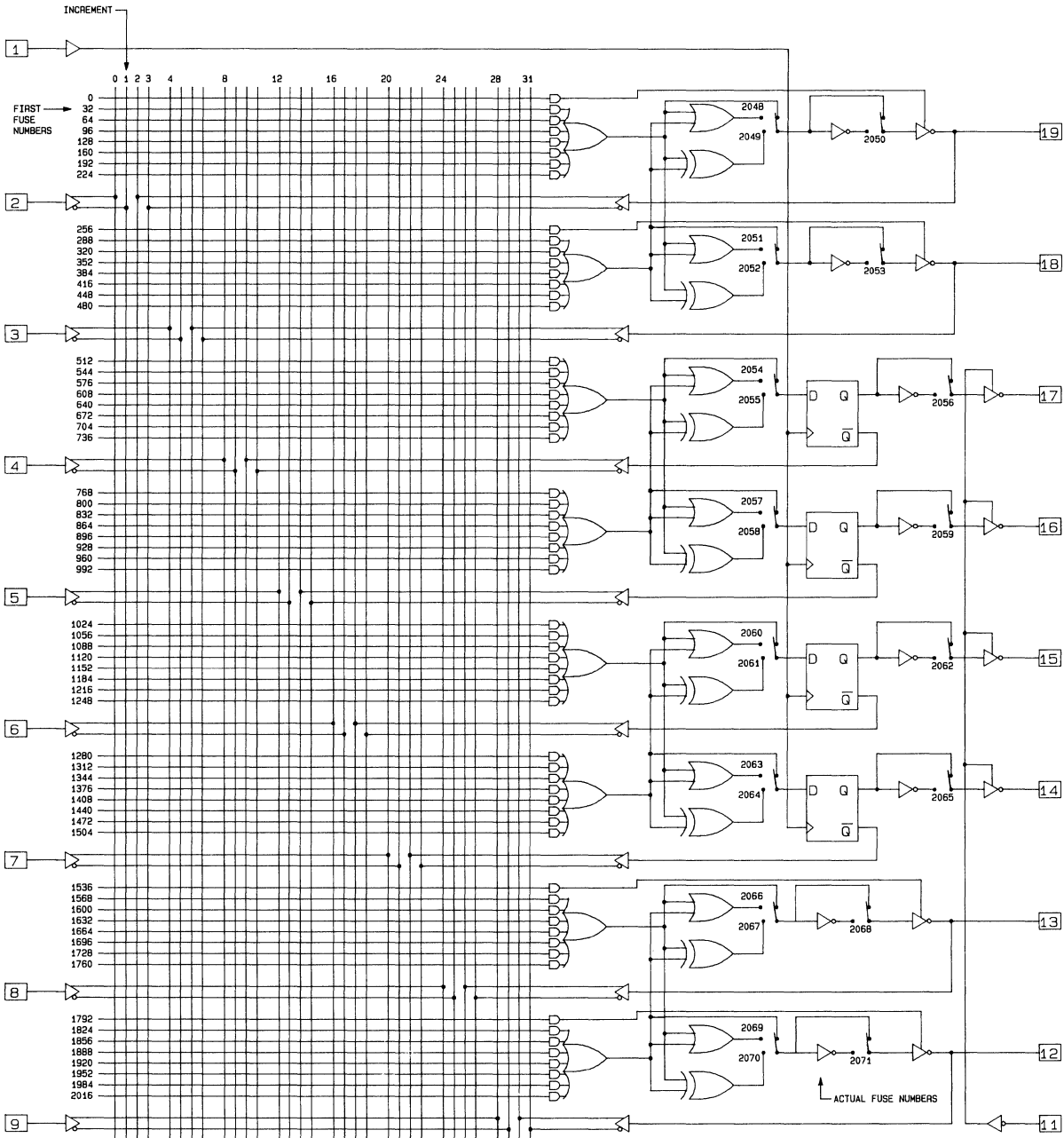


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

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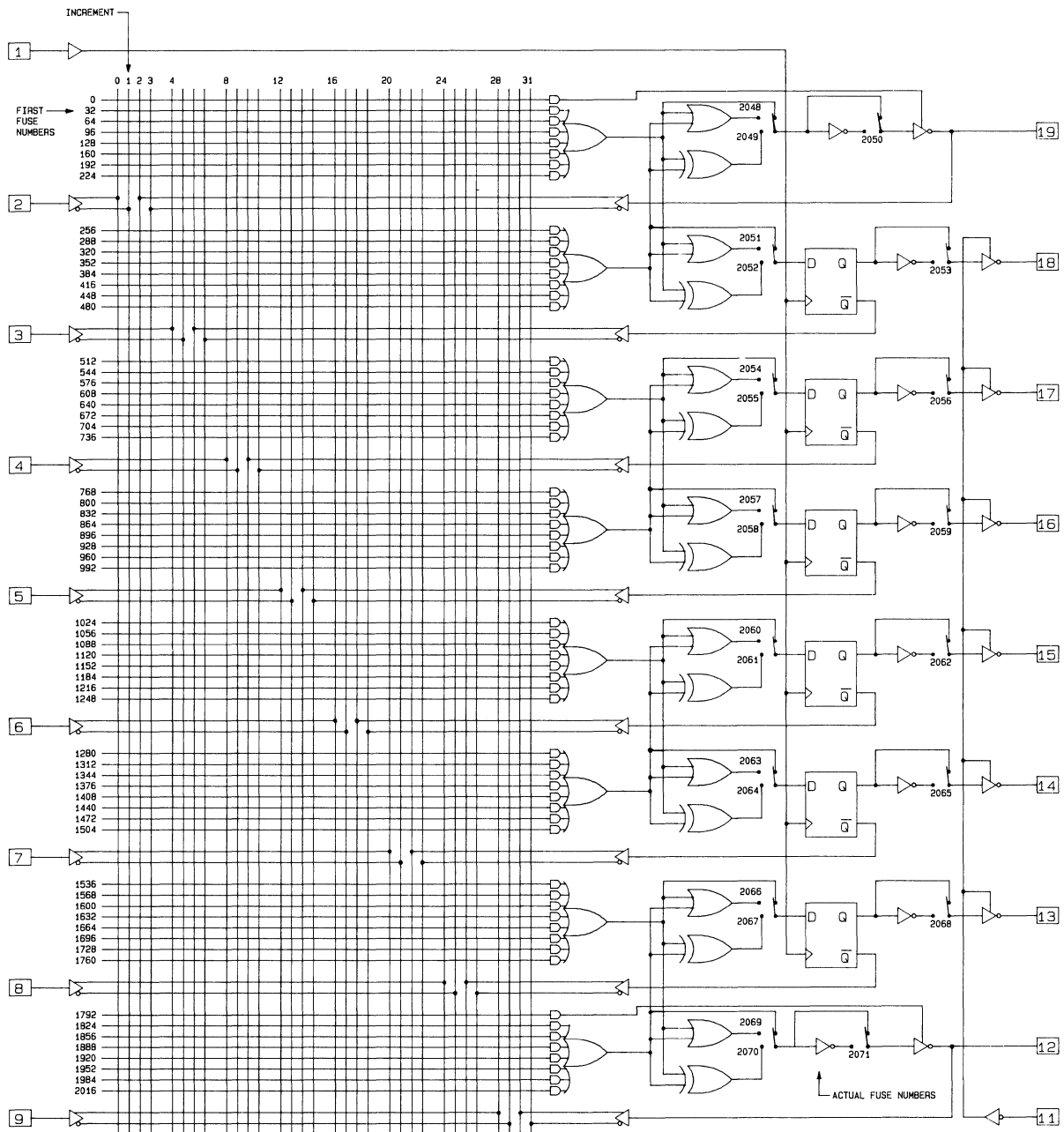
NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT



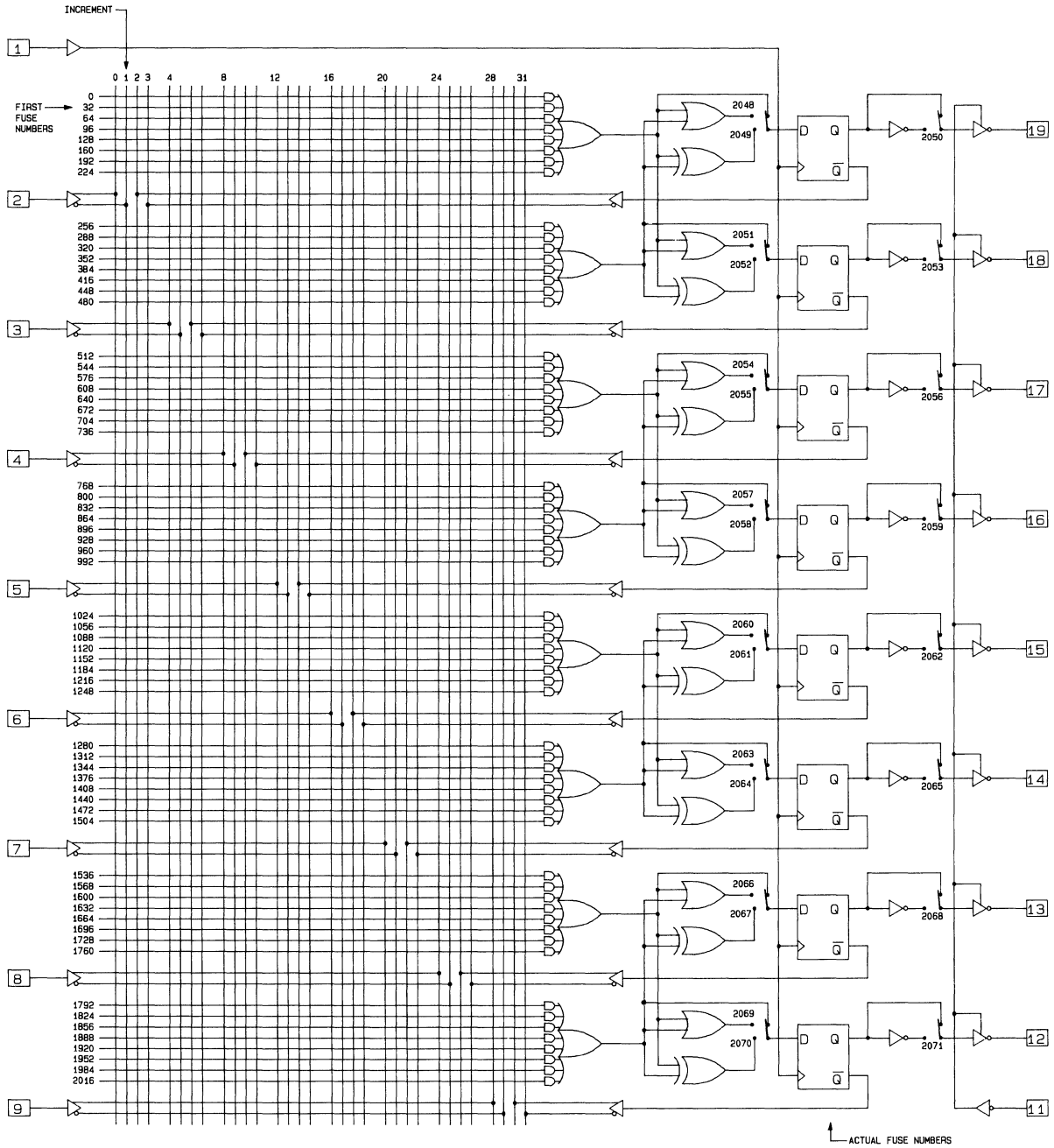
NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

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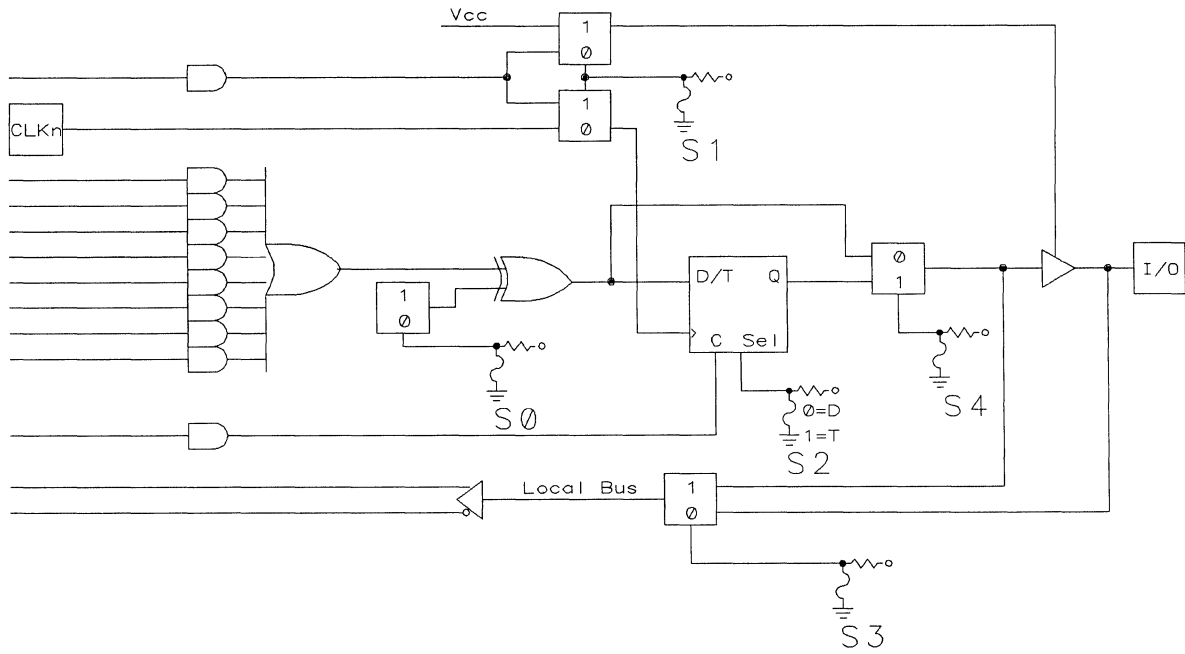


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

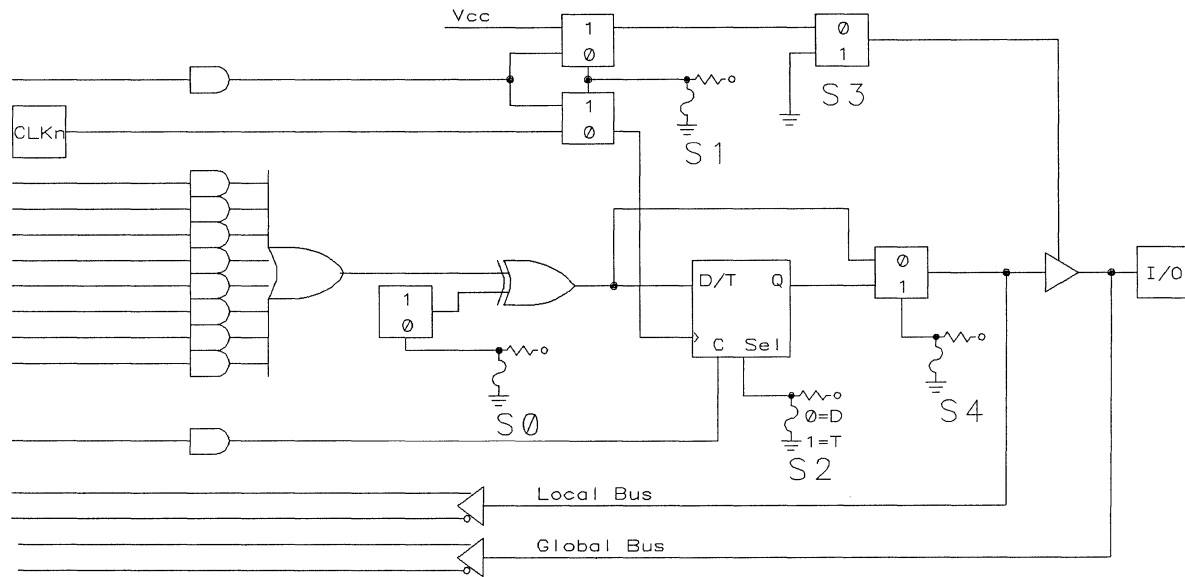


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT



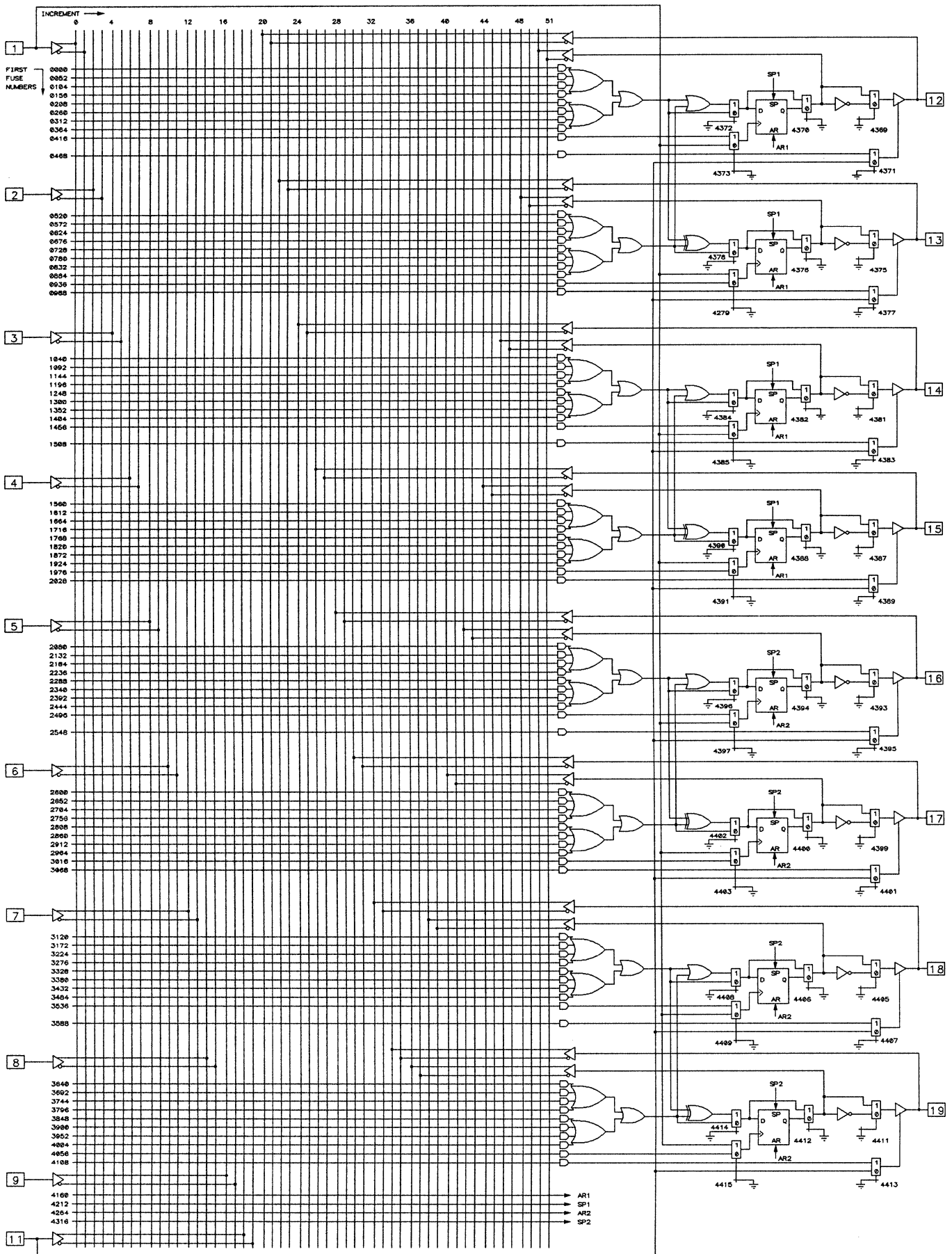


E1800 Local Output Macro-Cell



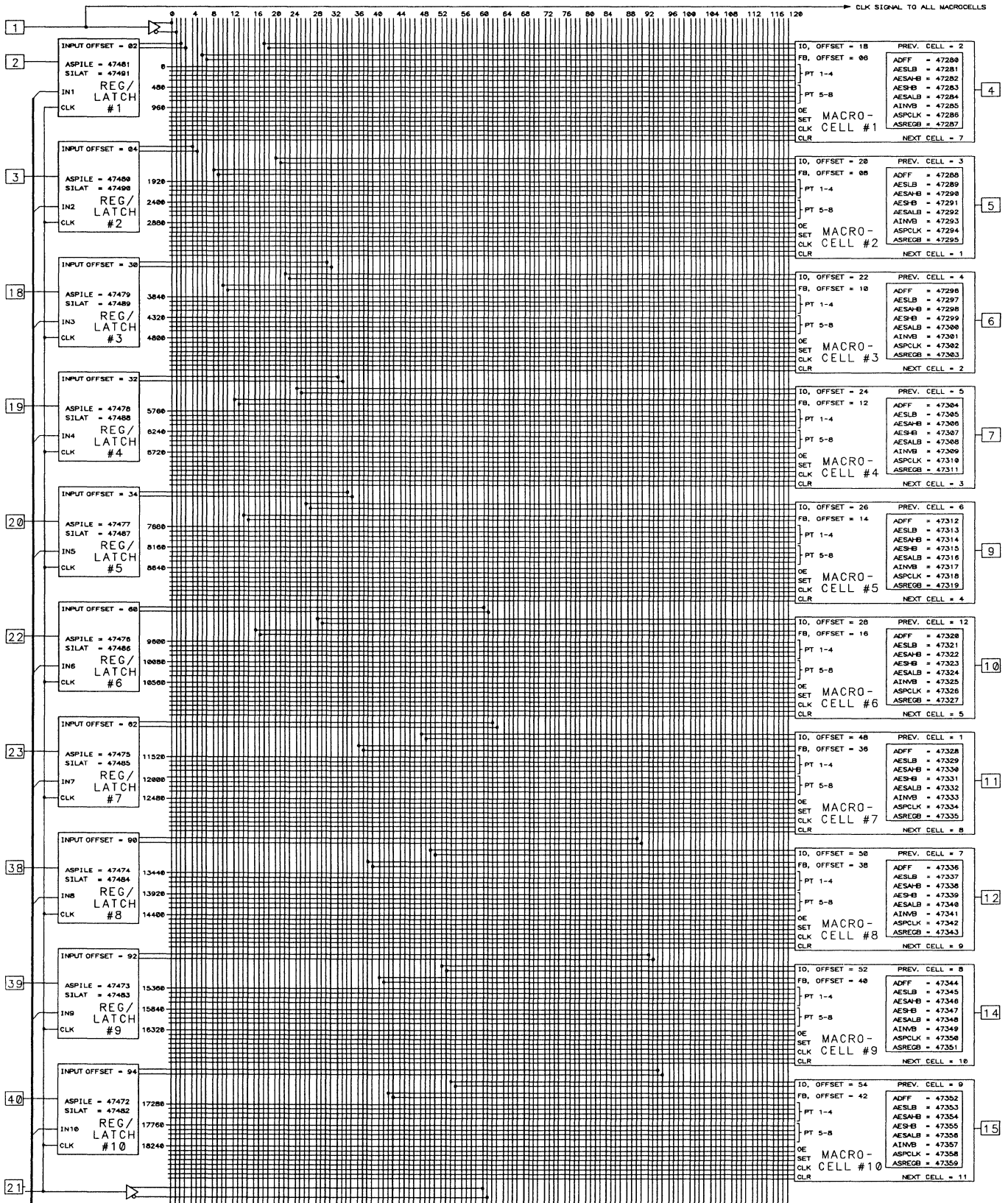
E1800 Global Output Macro-Cell

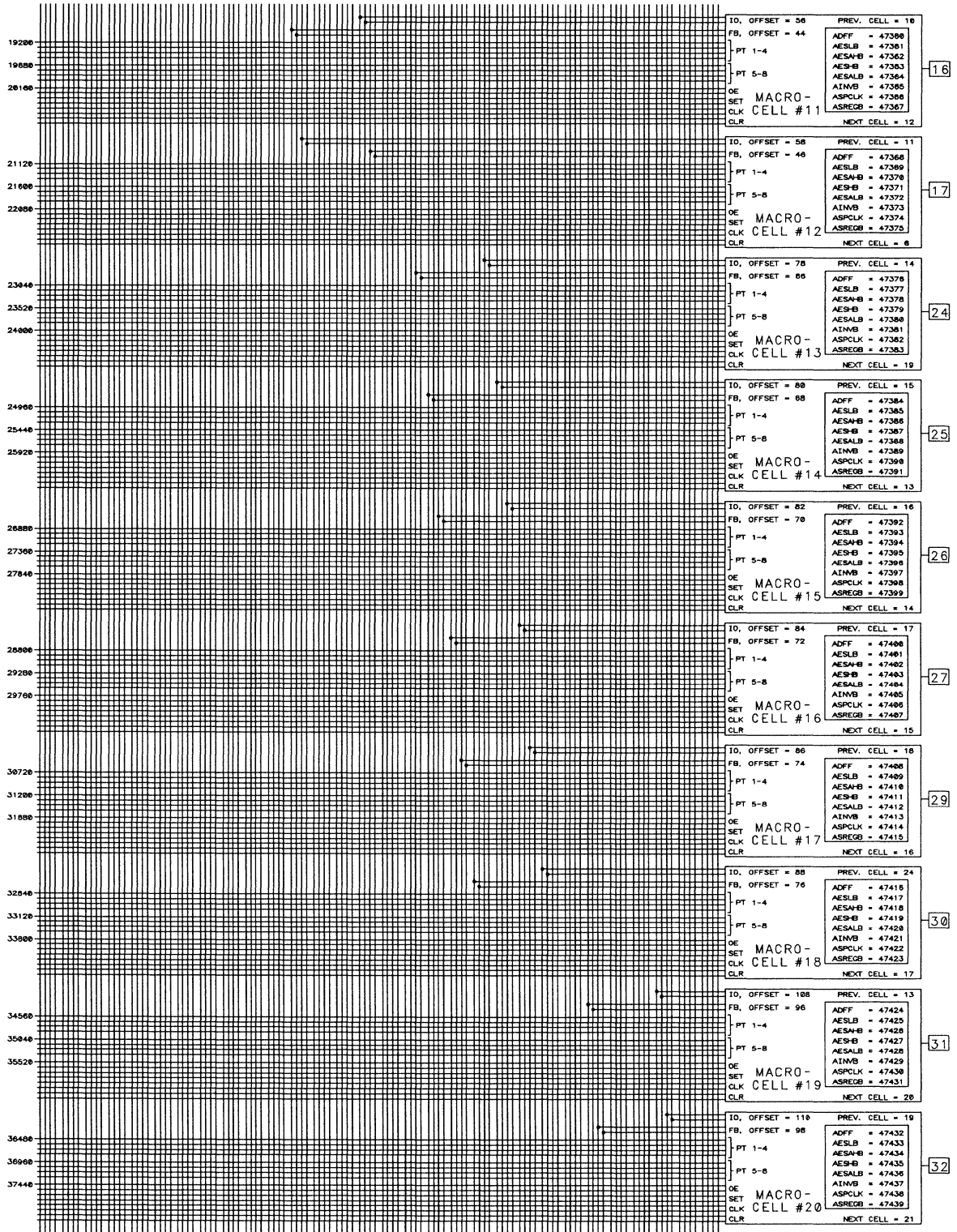
Macrocell	CLKn	Array	Fuses	
01 - 12	17	Quadrant A	120 x 88	00000 - 10559
13 - 24	19	Quadrant B	120 x 88	10560 - 21119
25 - 36	51	Quadrant C	120 x 88	21120 - 31679
37 - 48	53	Quadrant D	120 x 88	31680 - 42239
		Architecture Fuses	48 x 5	42240 - 42479
		Miser Fuses		42480 - 42487
		Turbo Fuses		4248, 42489

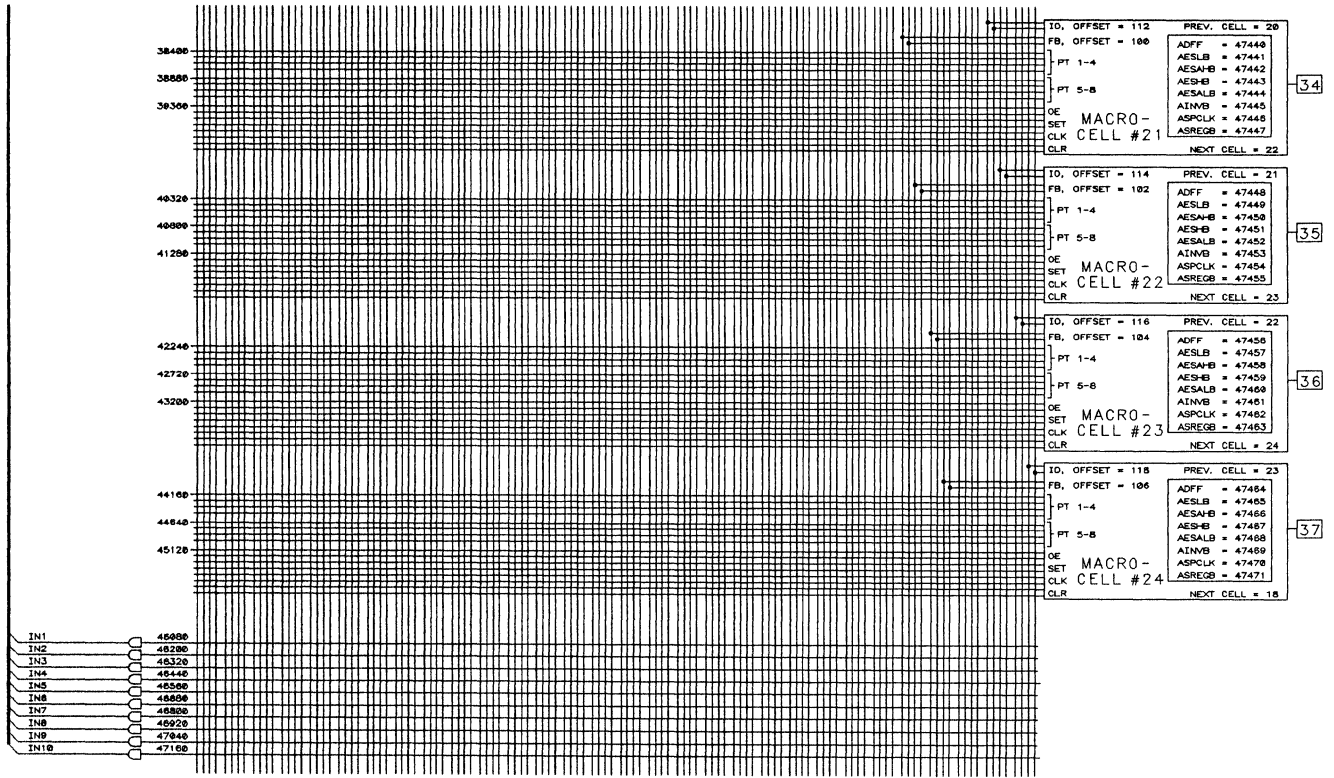


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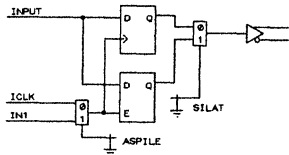
Data I/O Corporation



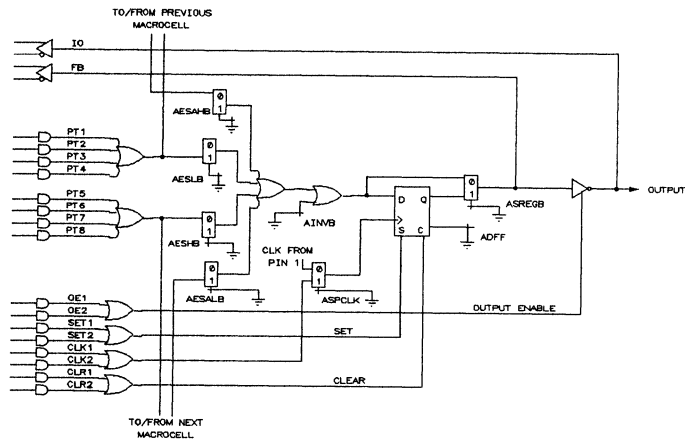


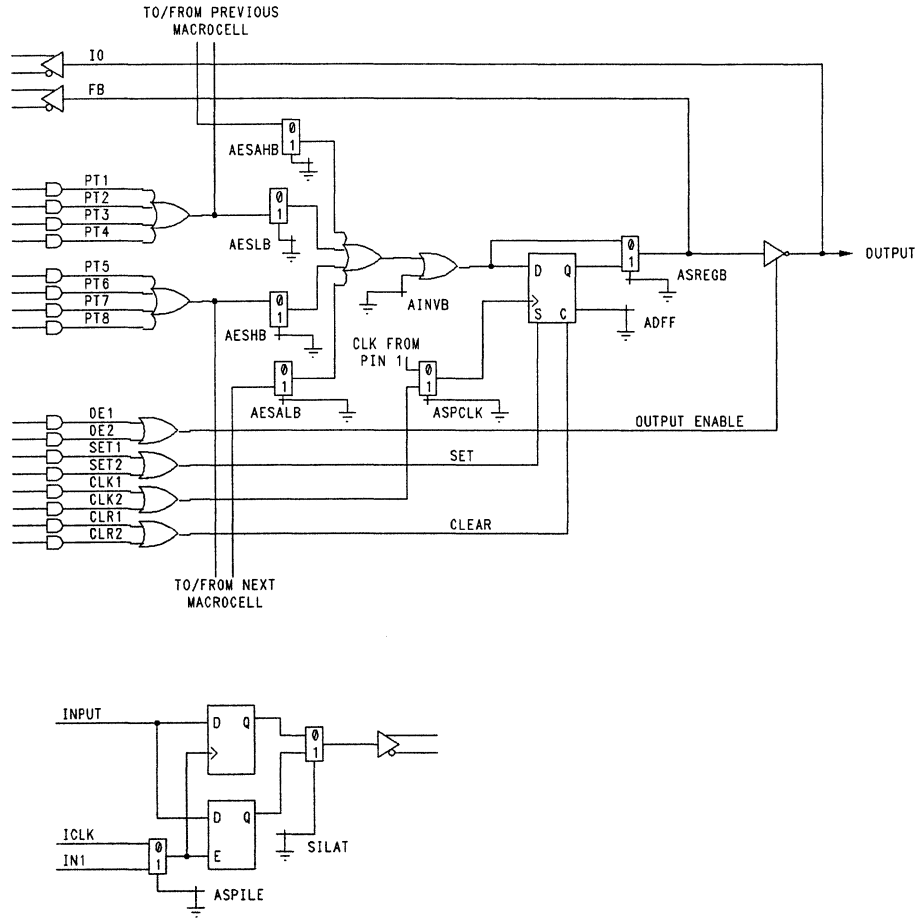


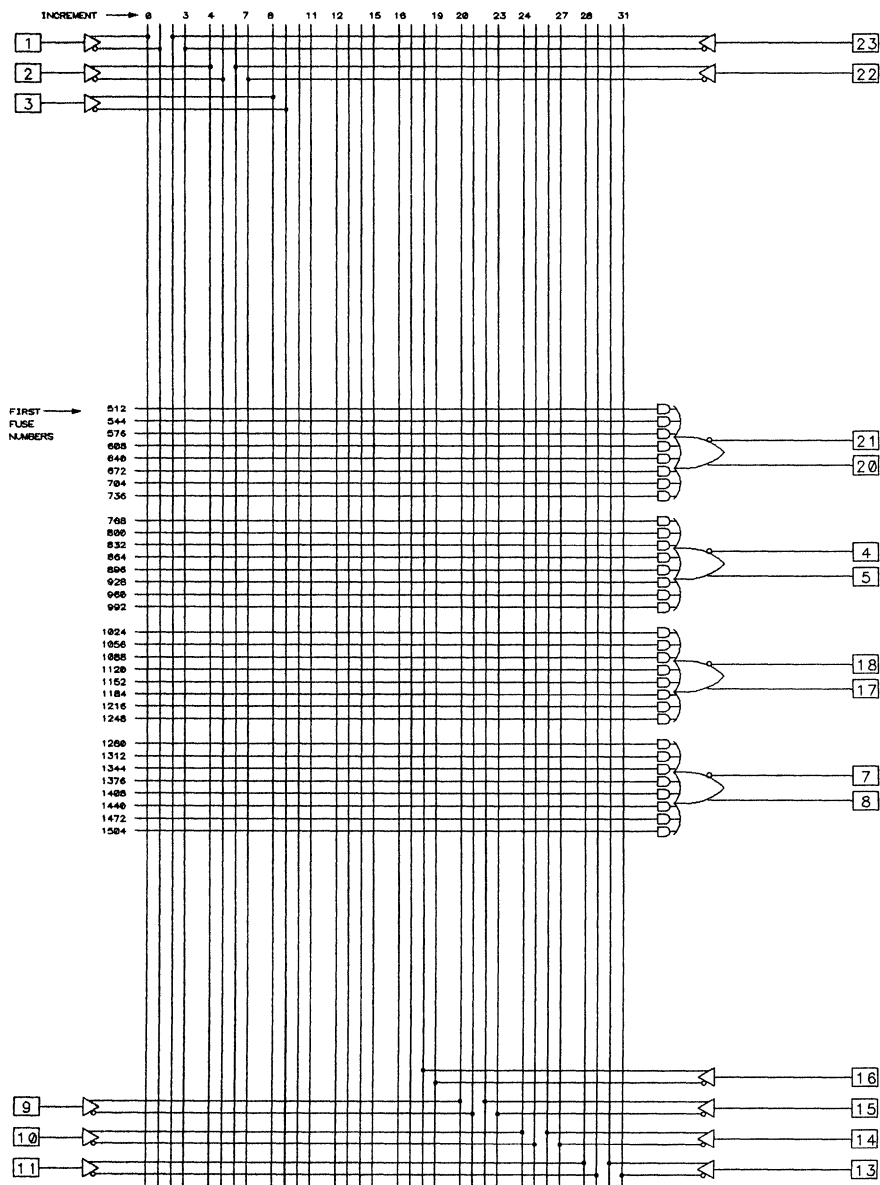
REG/LATCH (TYPICAL)



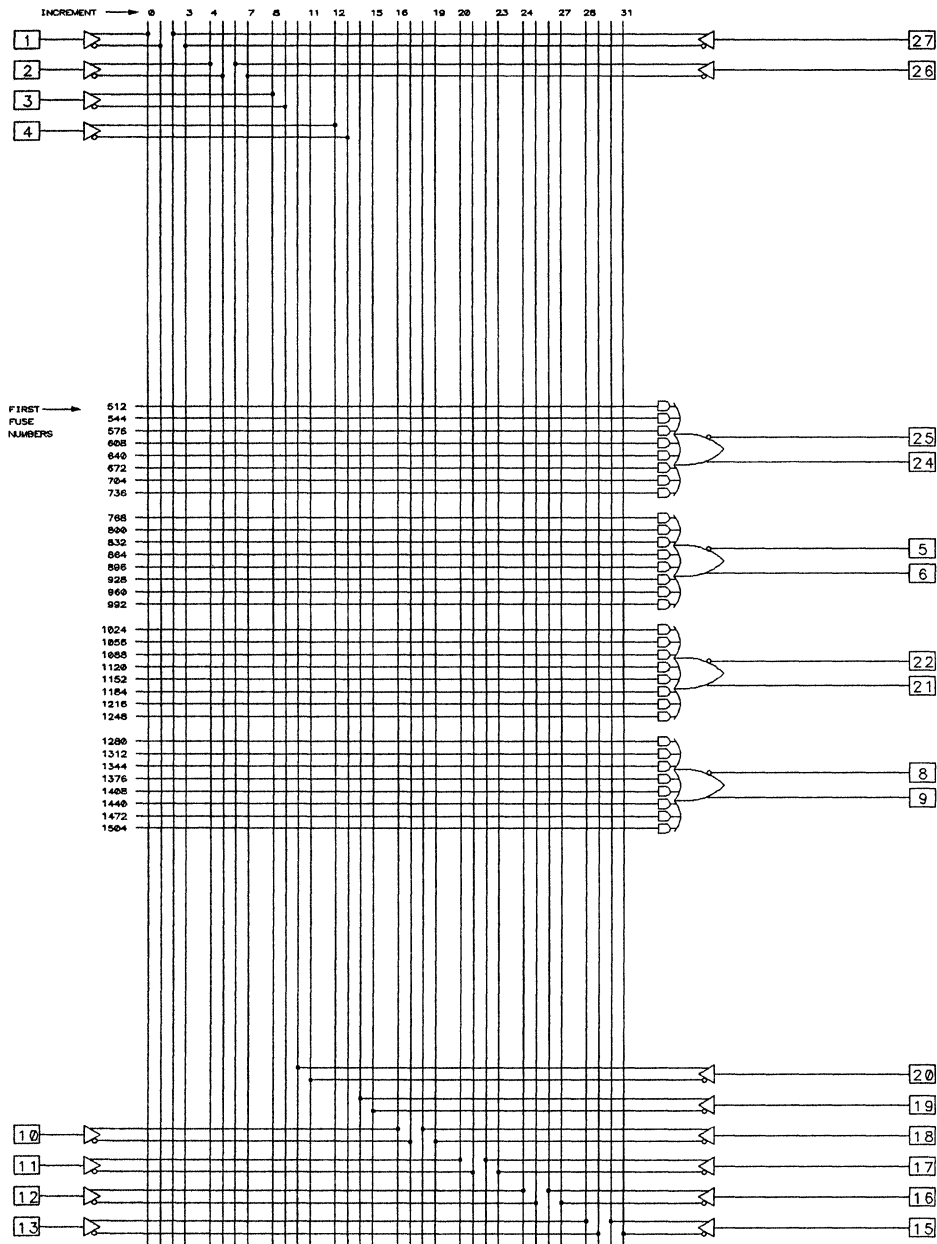
MACROCELL (TYPICAL)





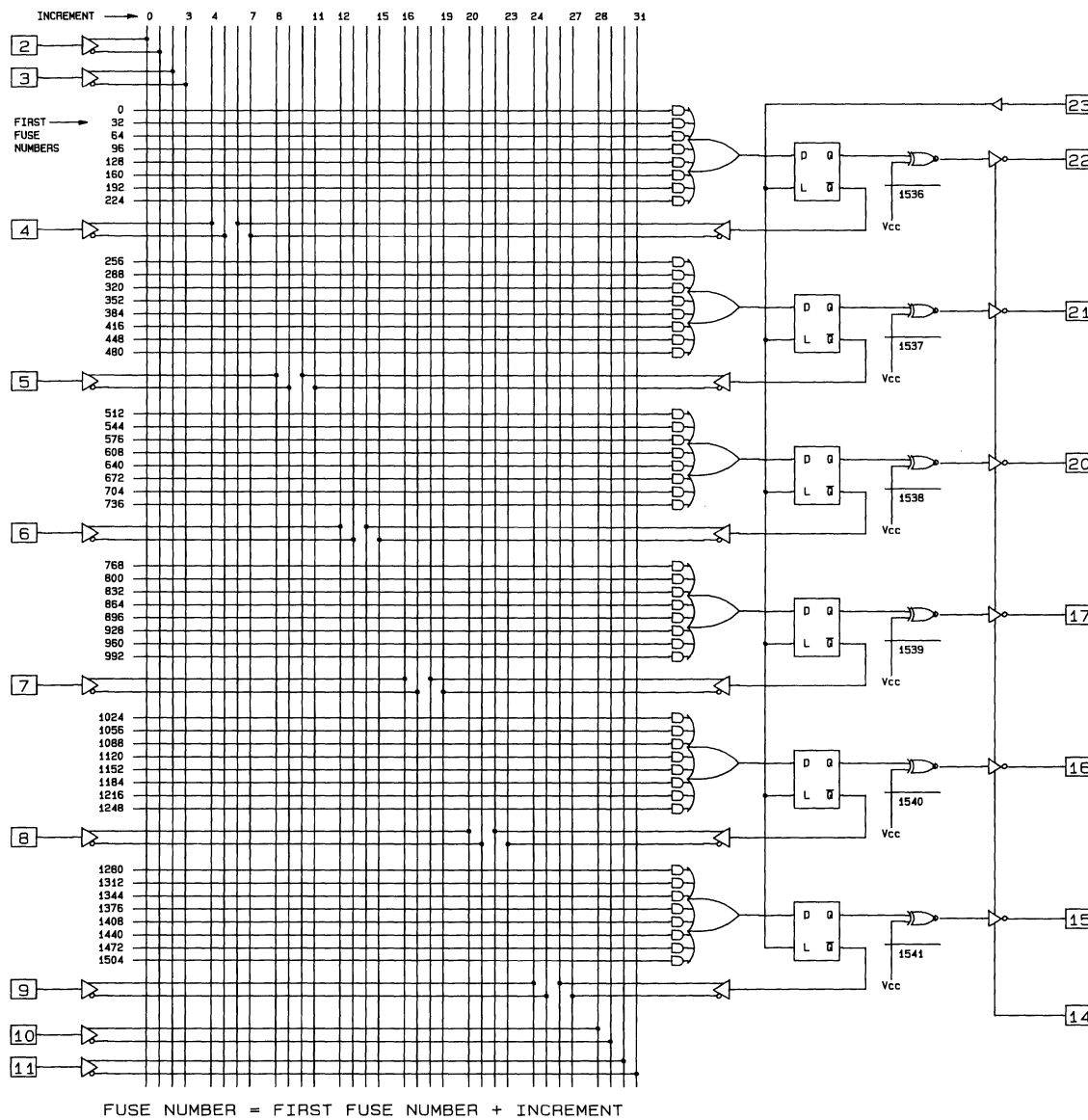


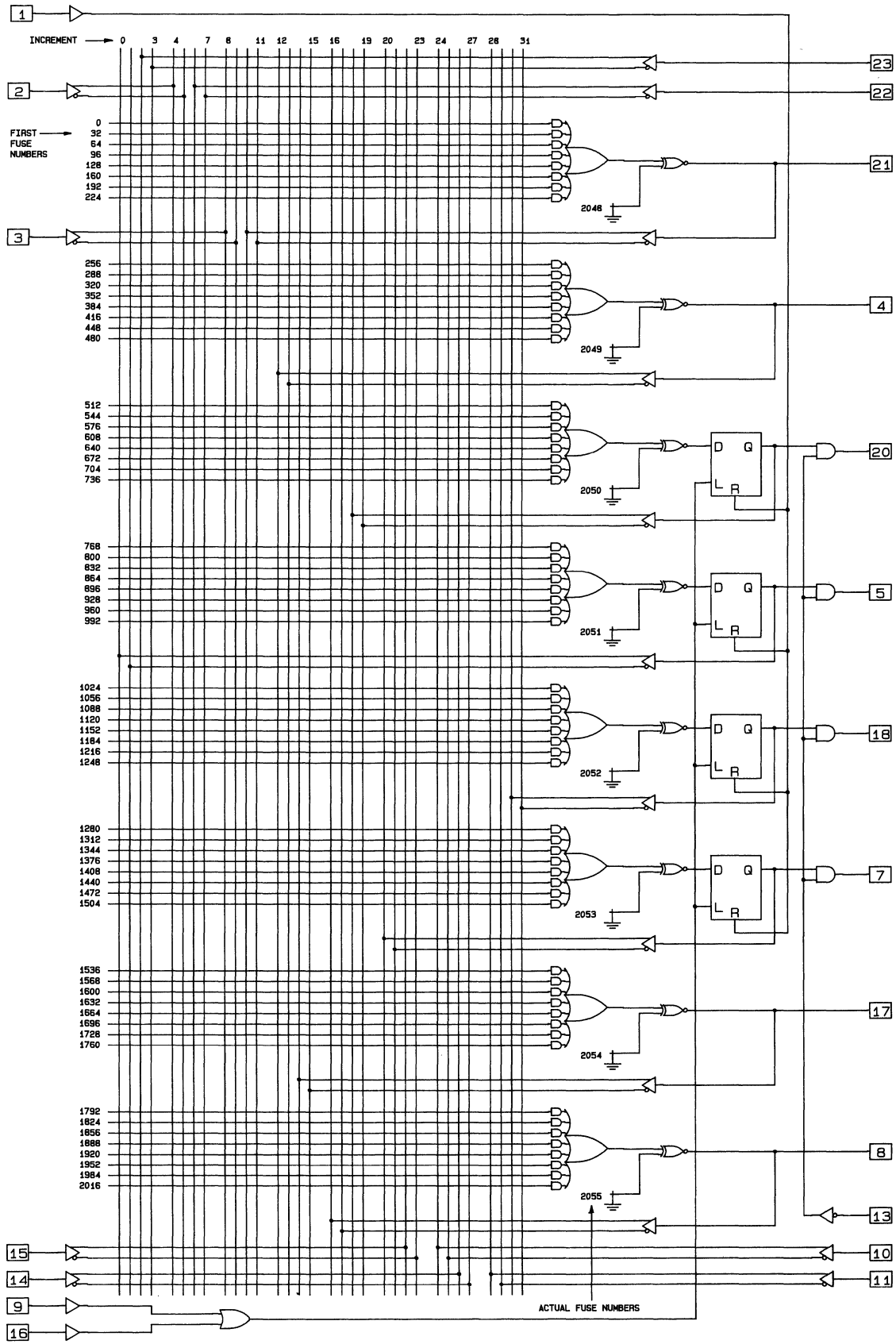
FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT



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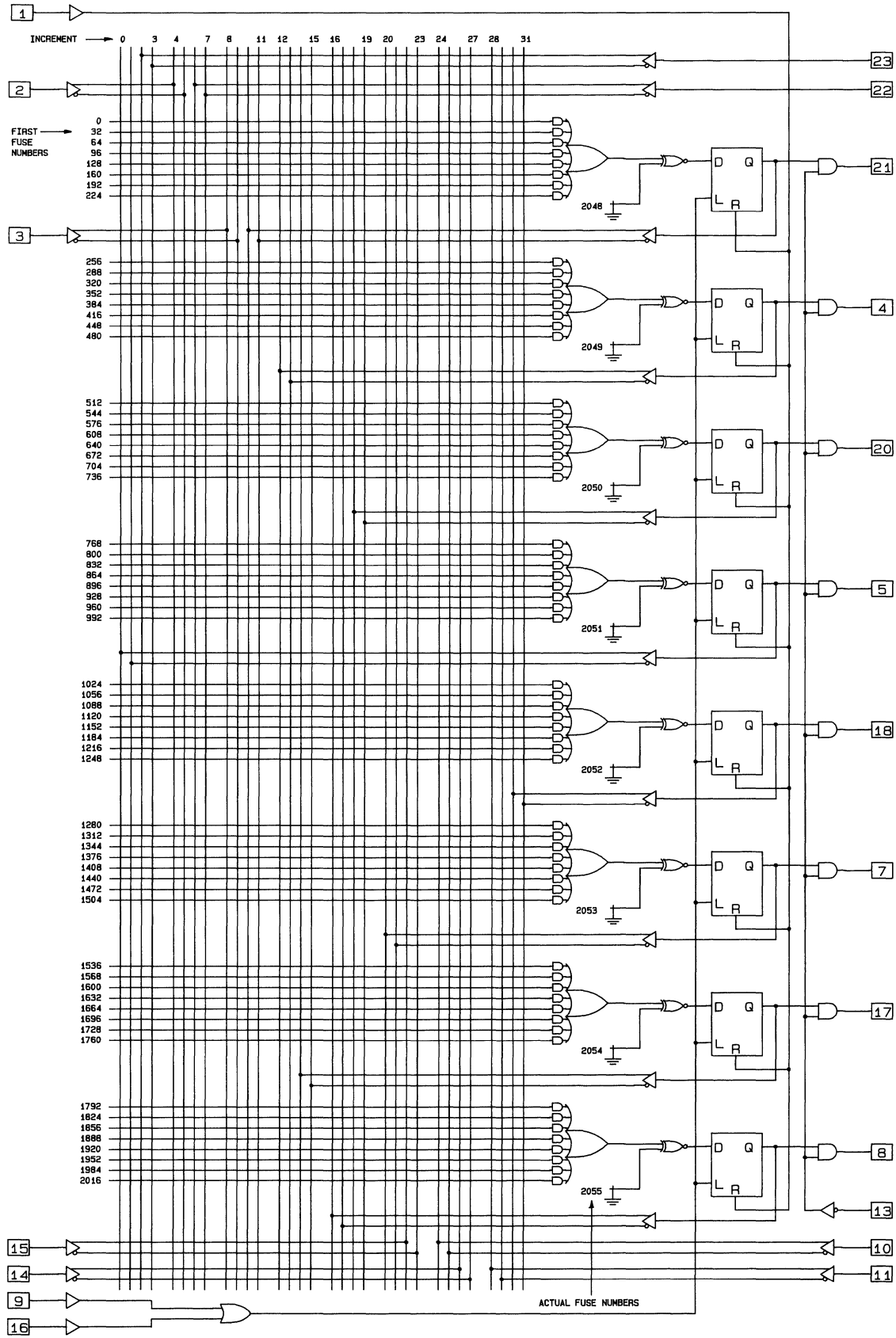




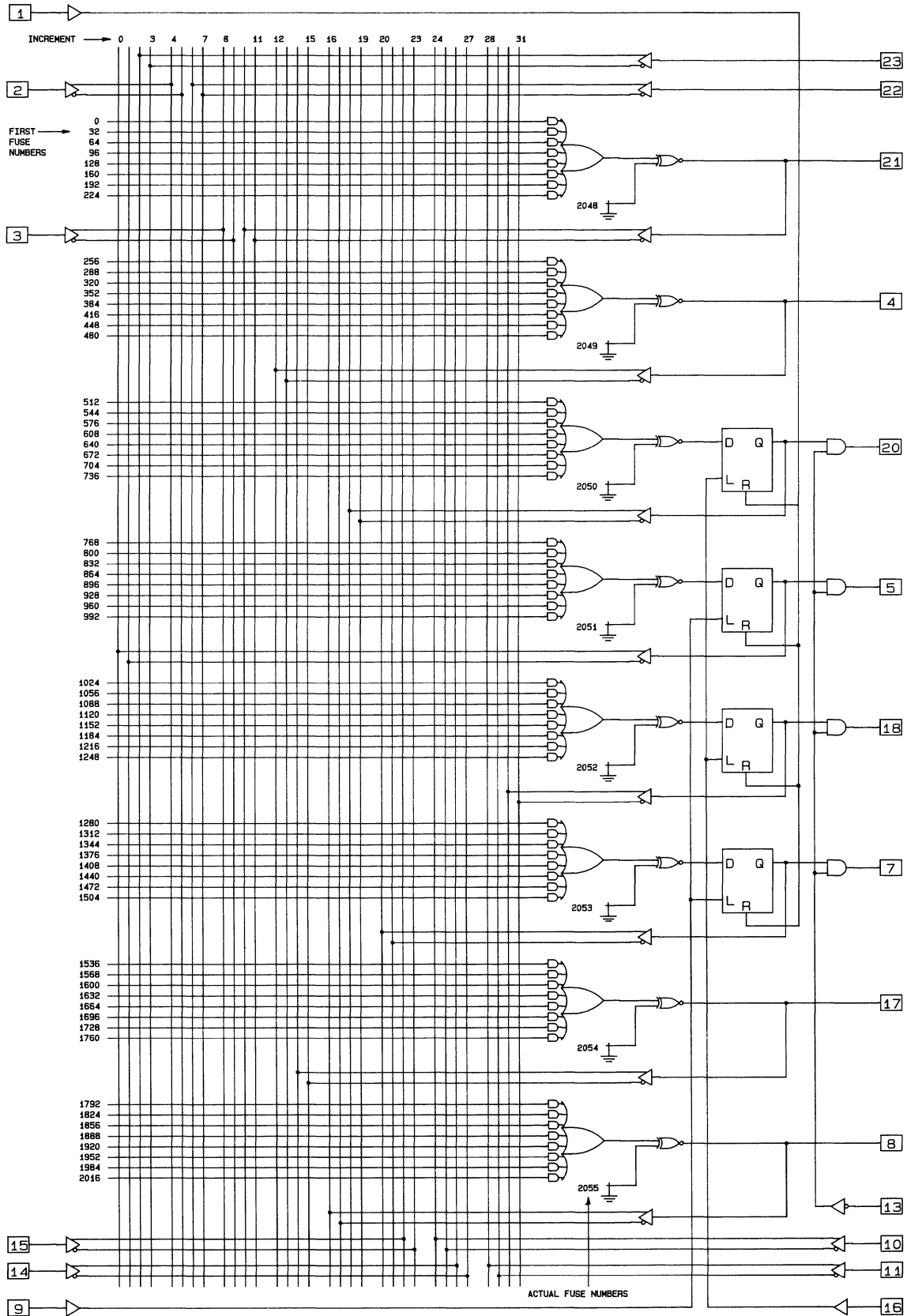


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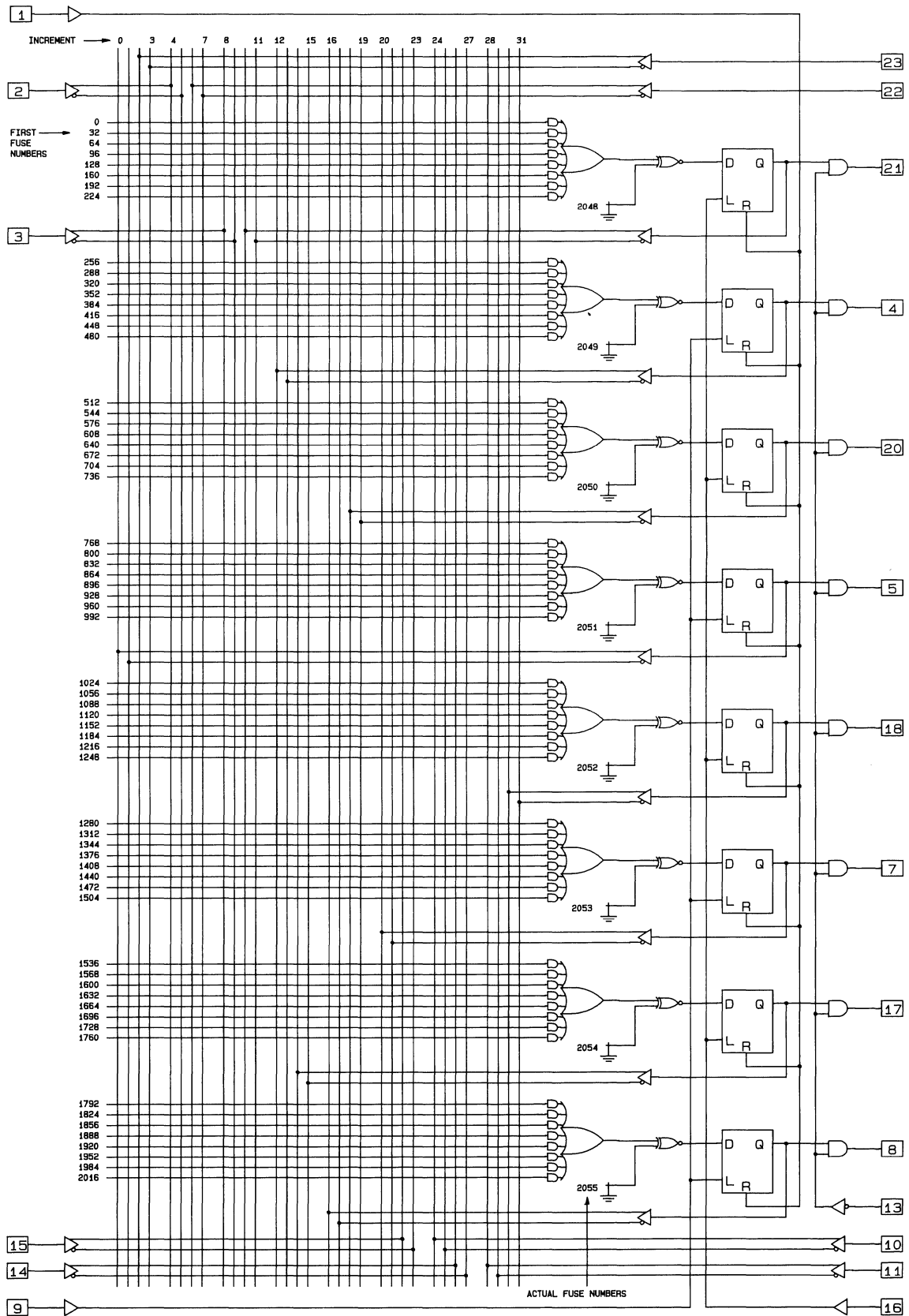


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

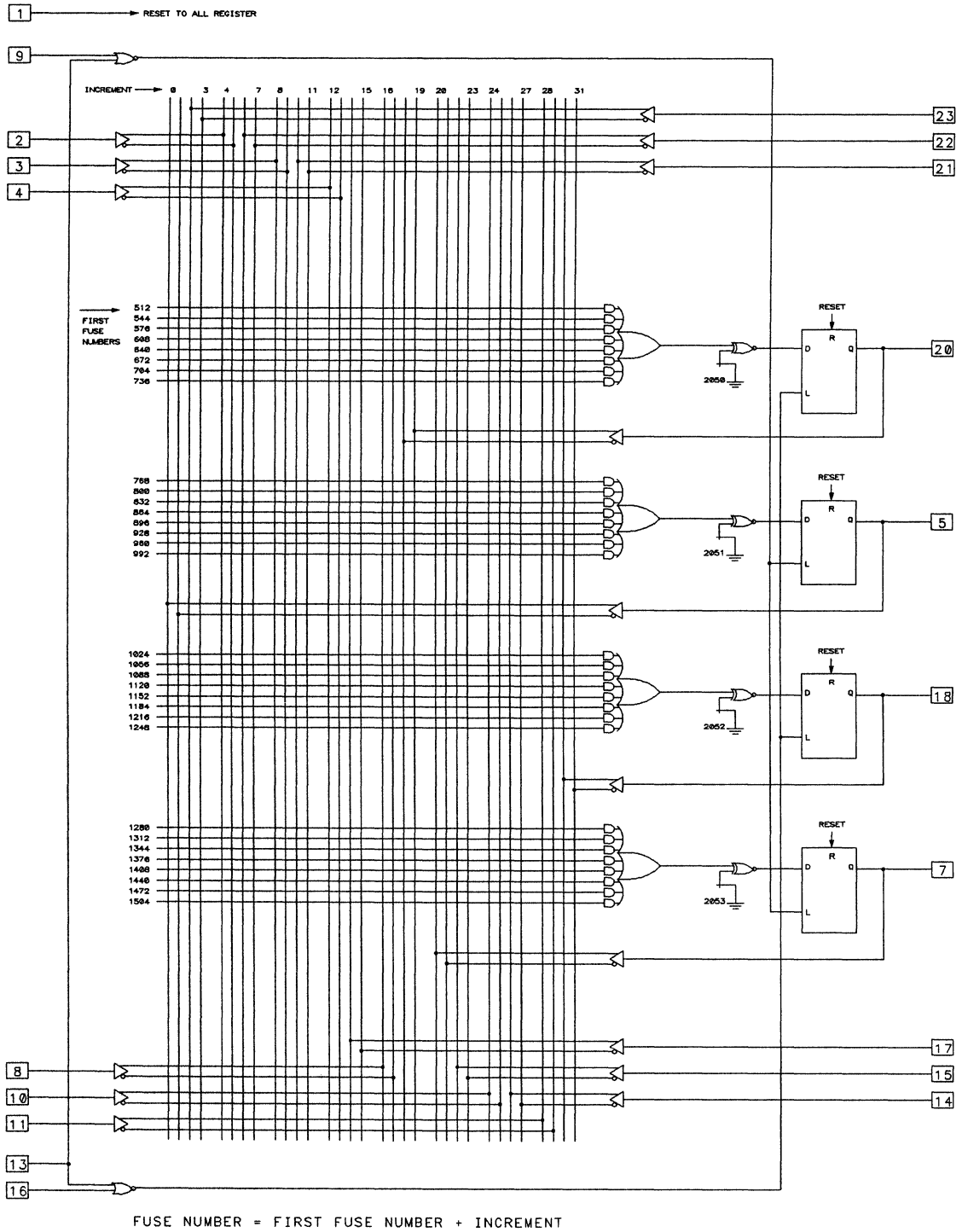


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

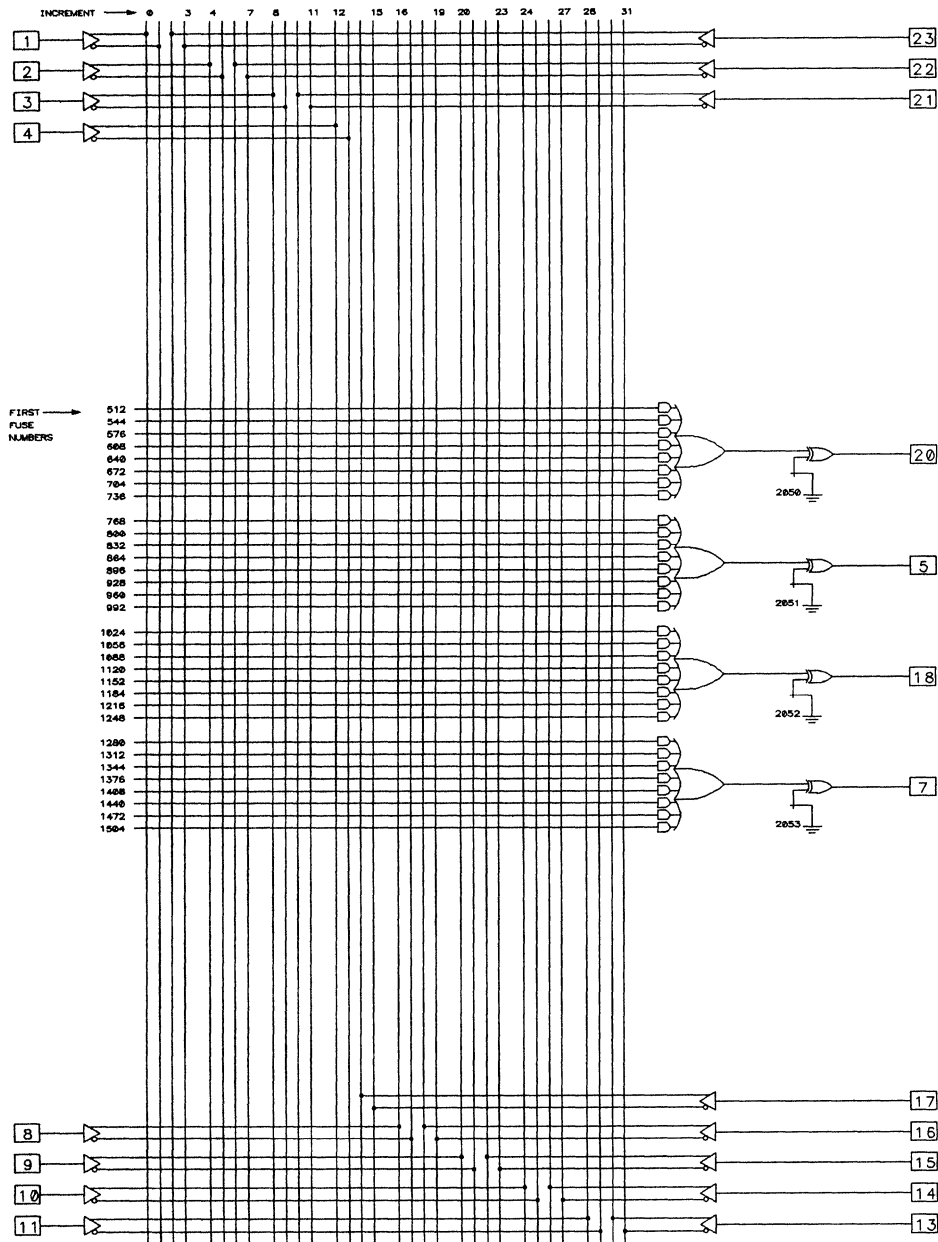
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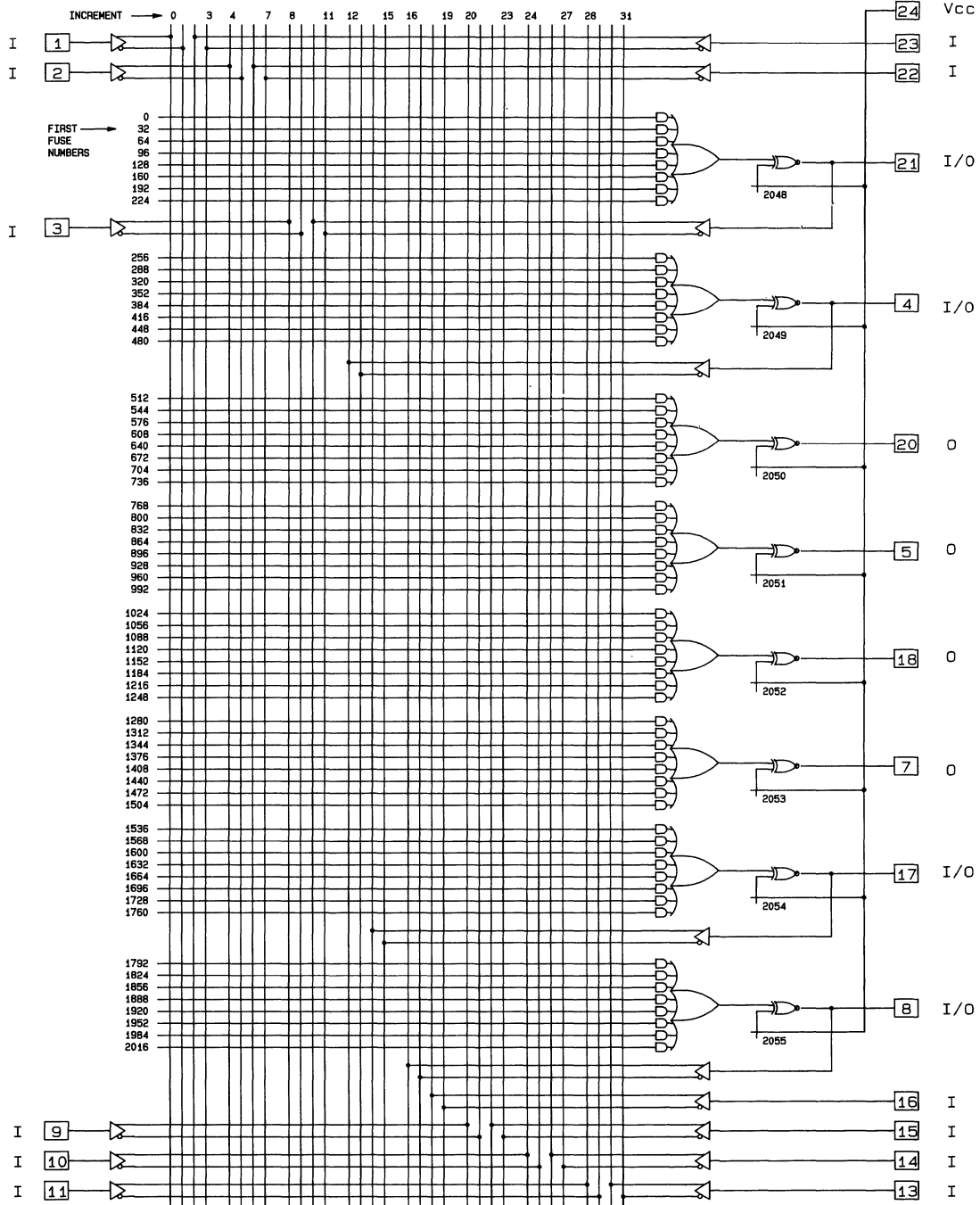
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Data I/O Corporation



FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

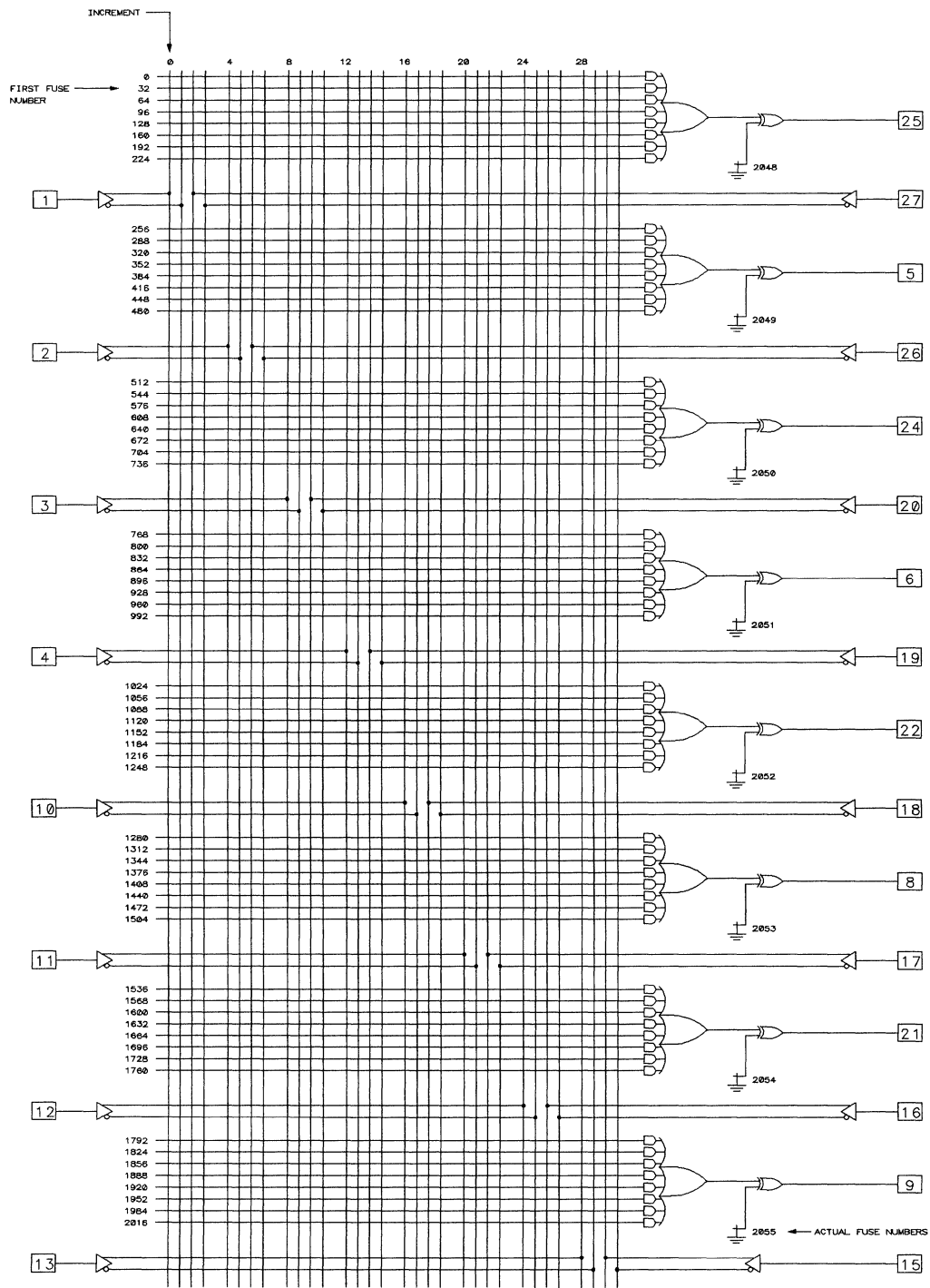


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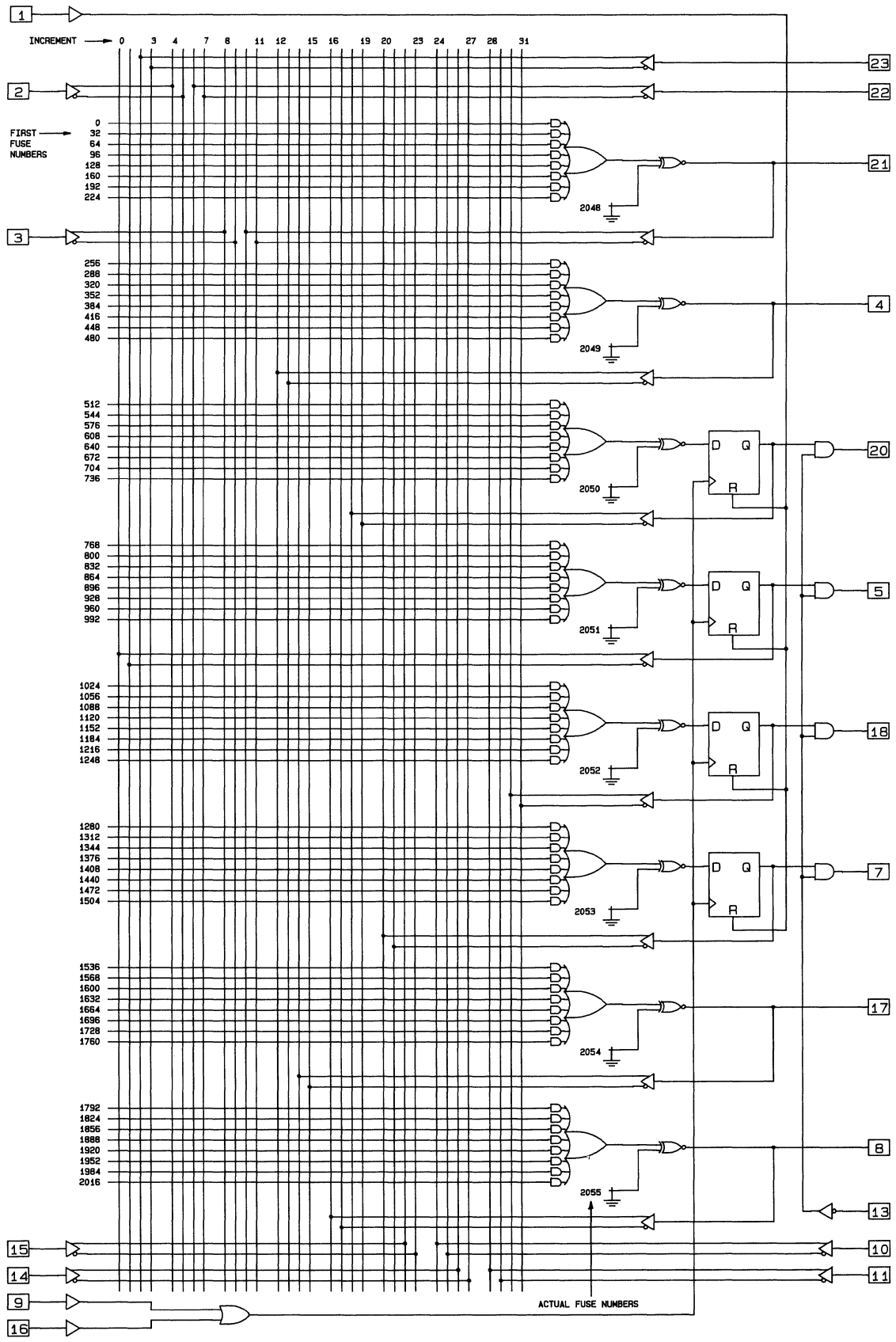
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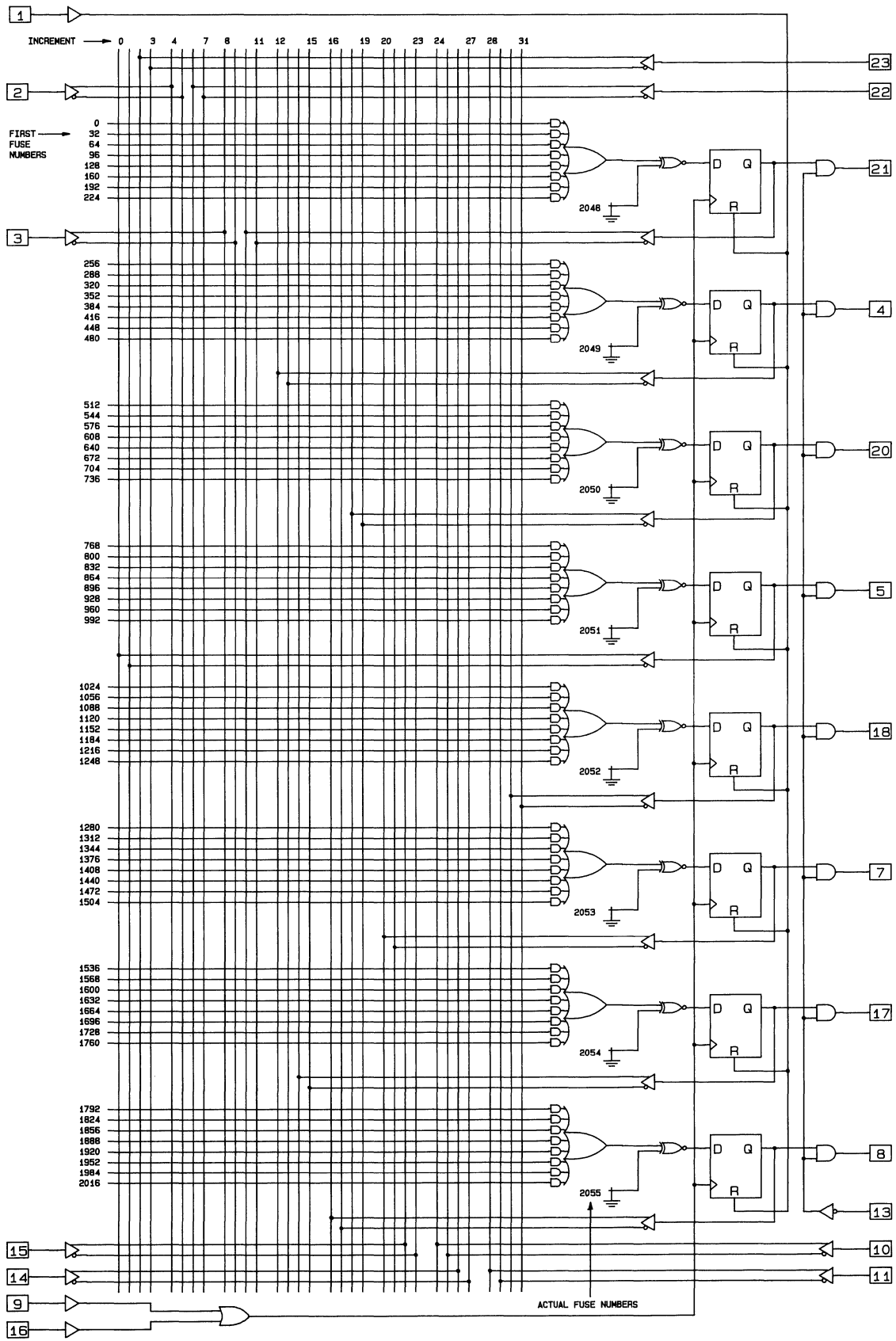
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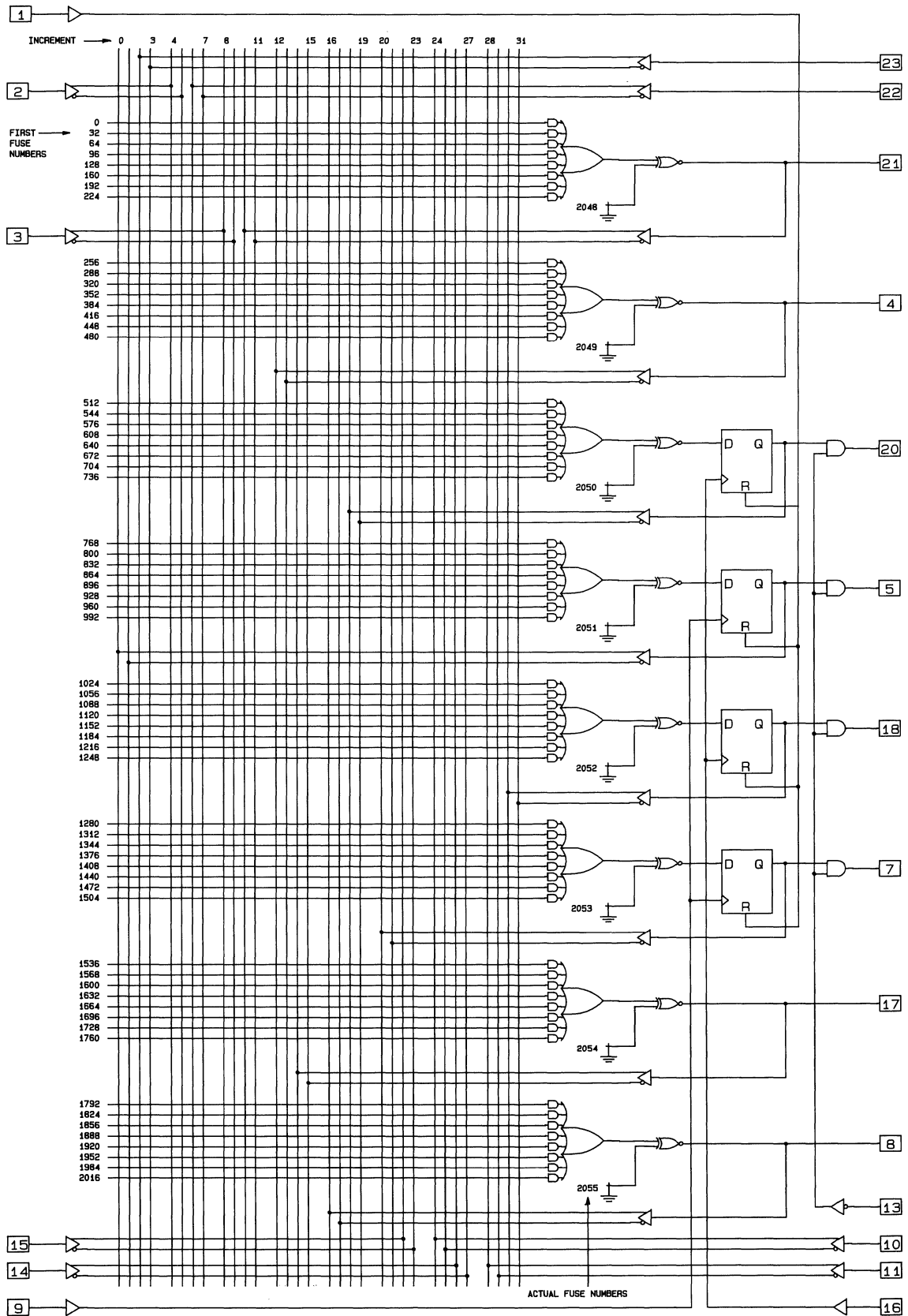
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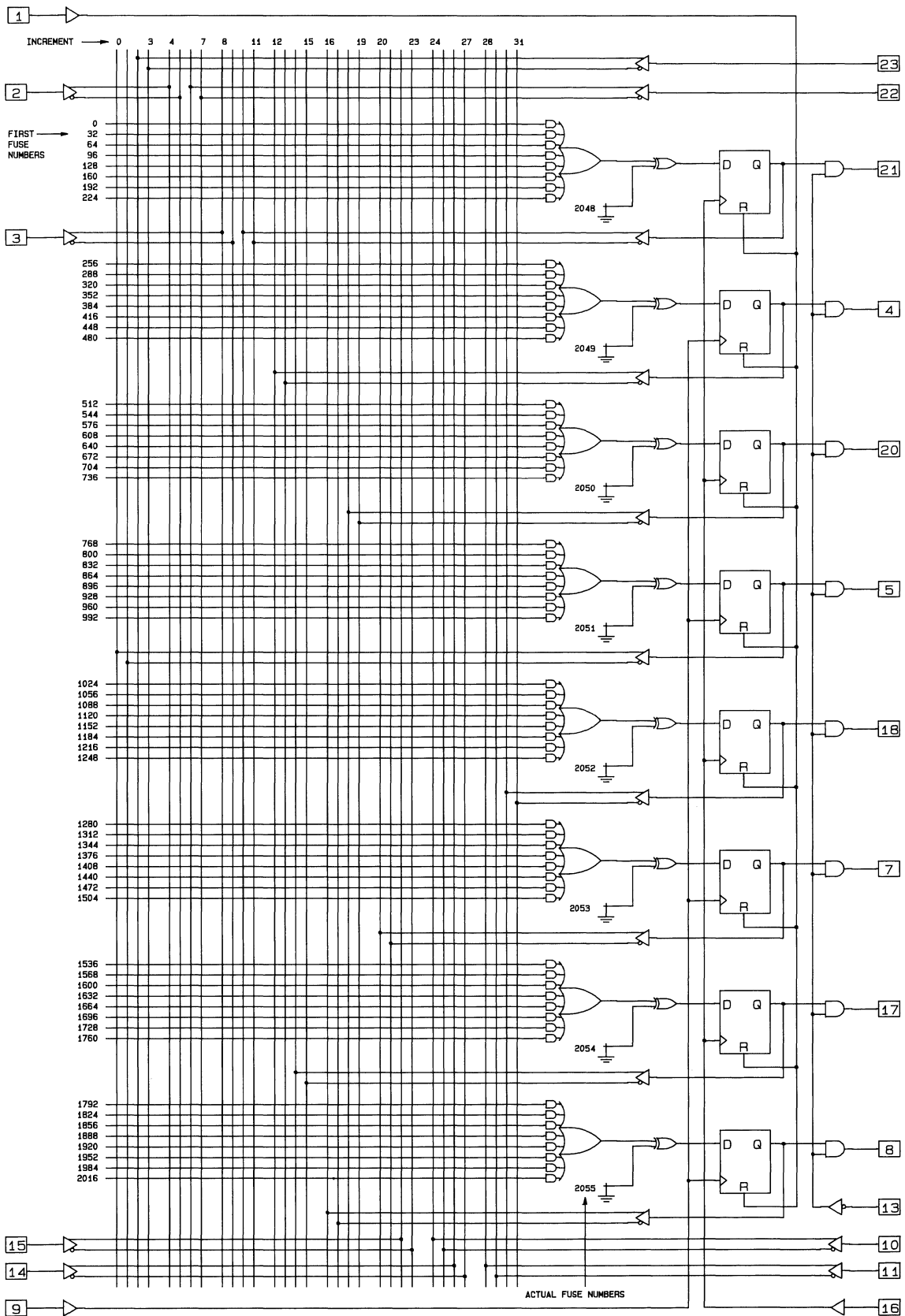


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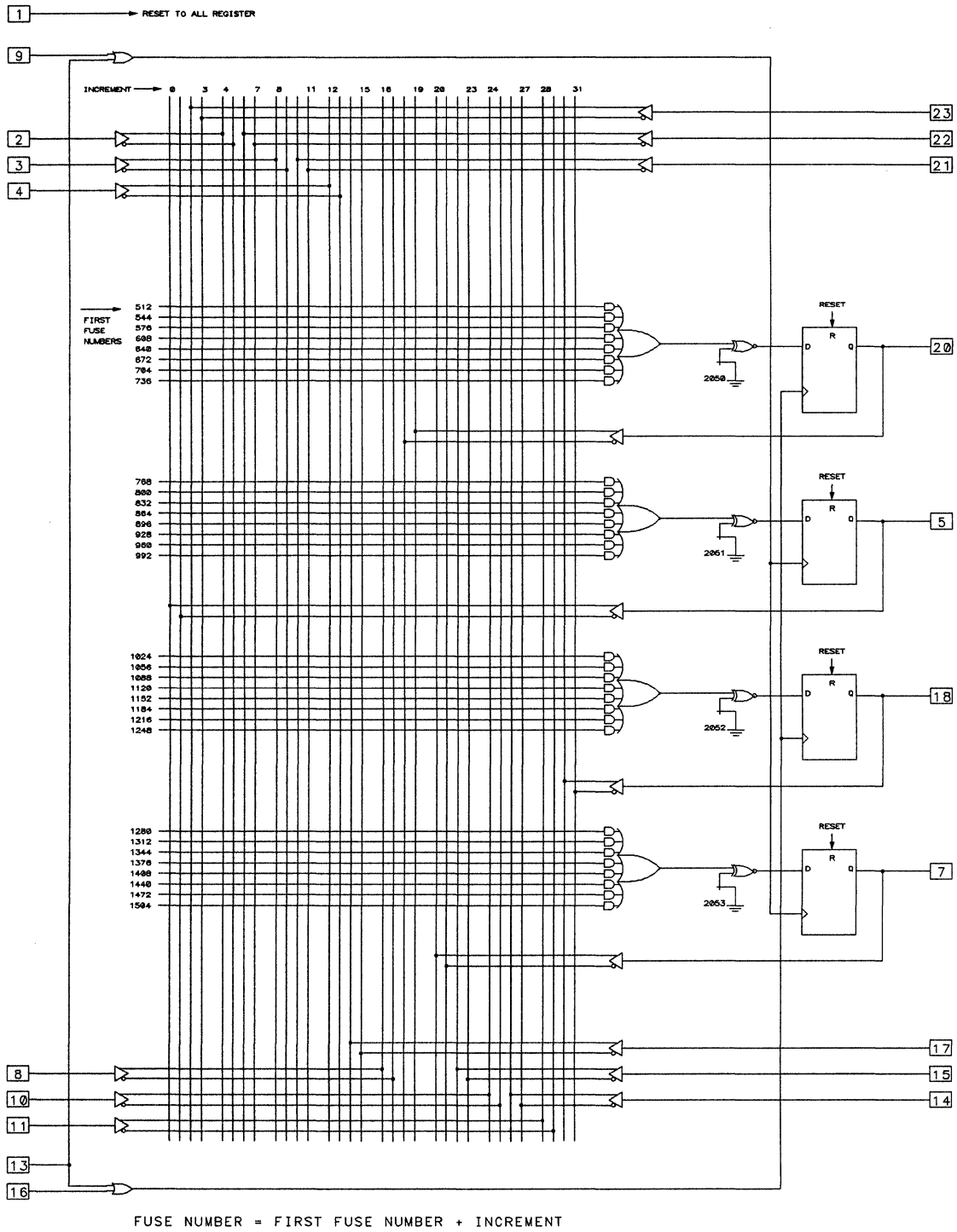


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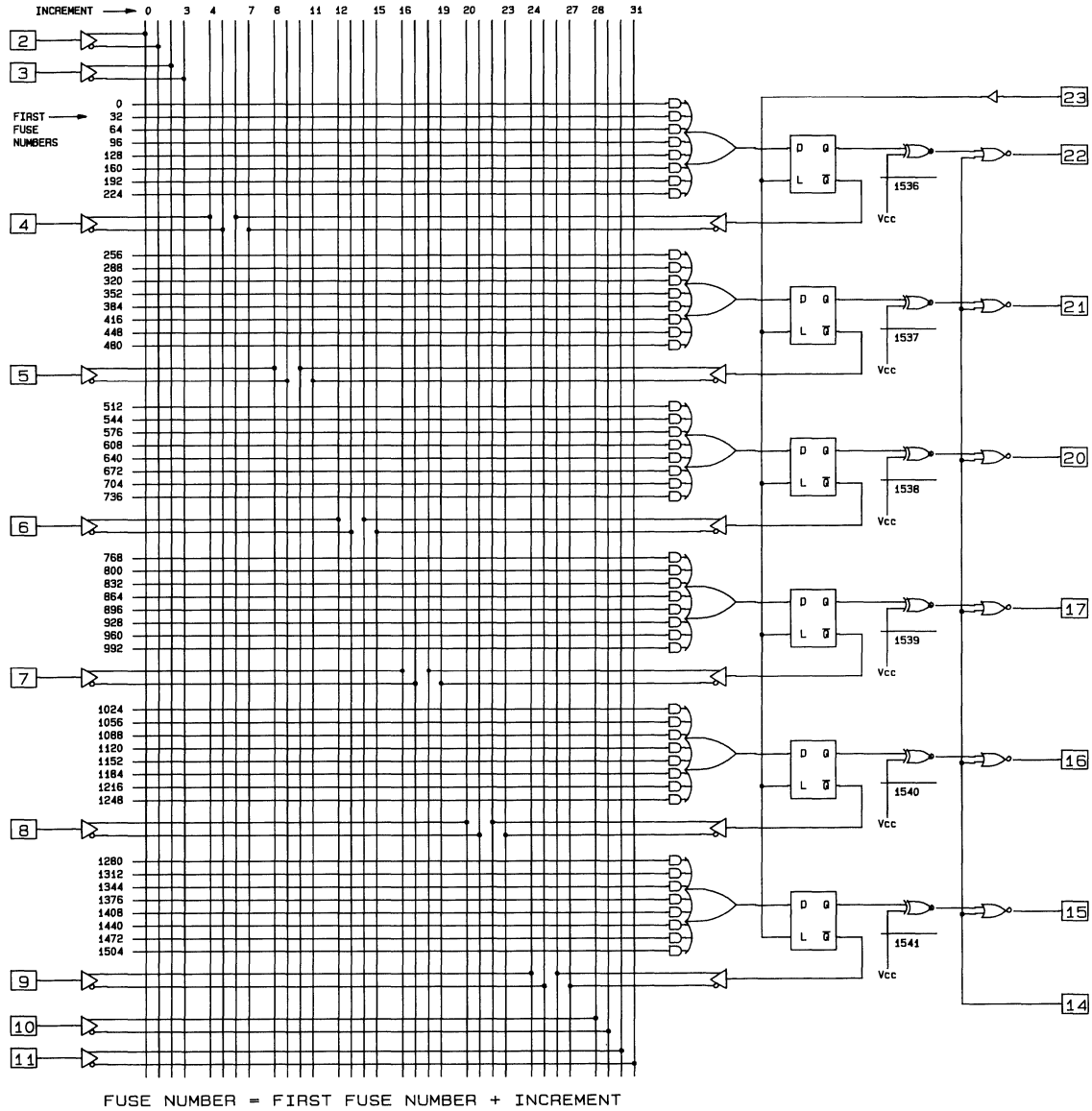
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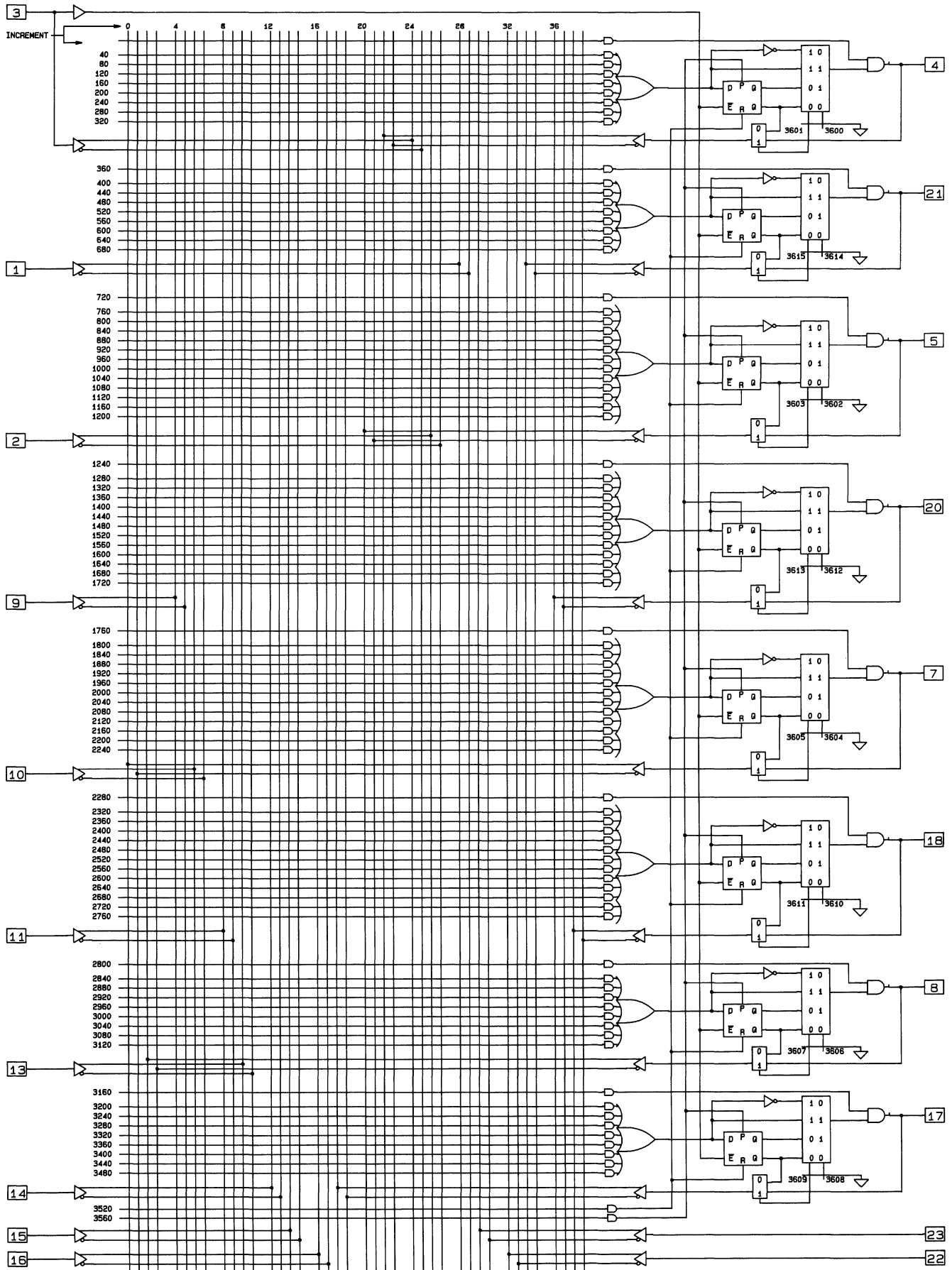


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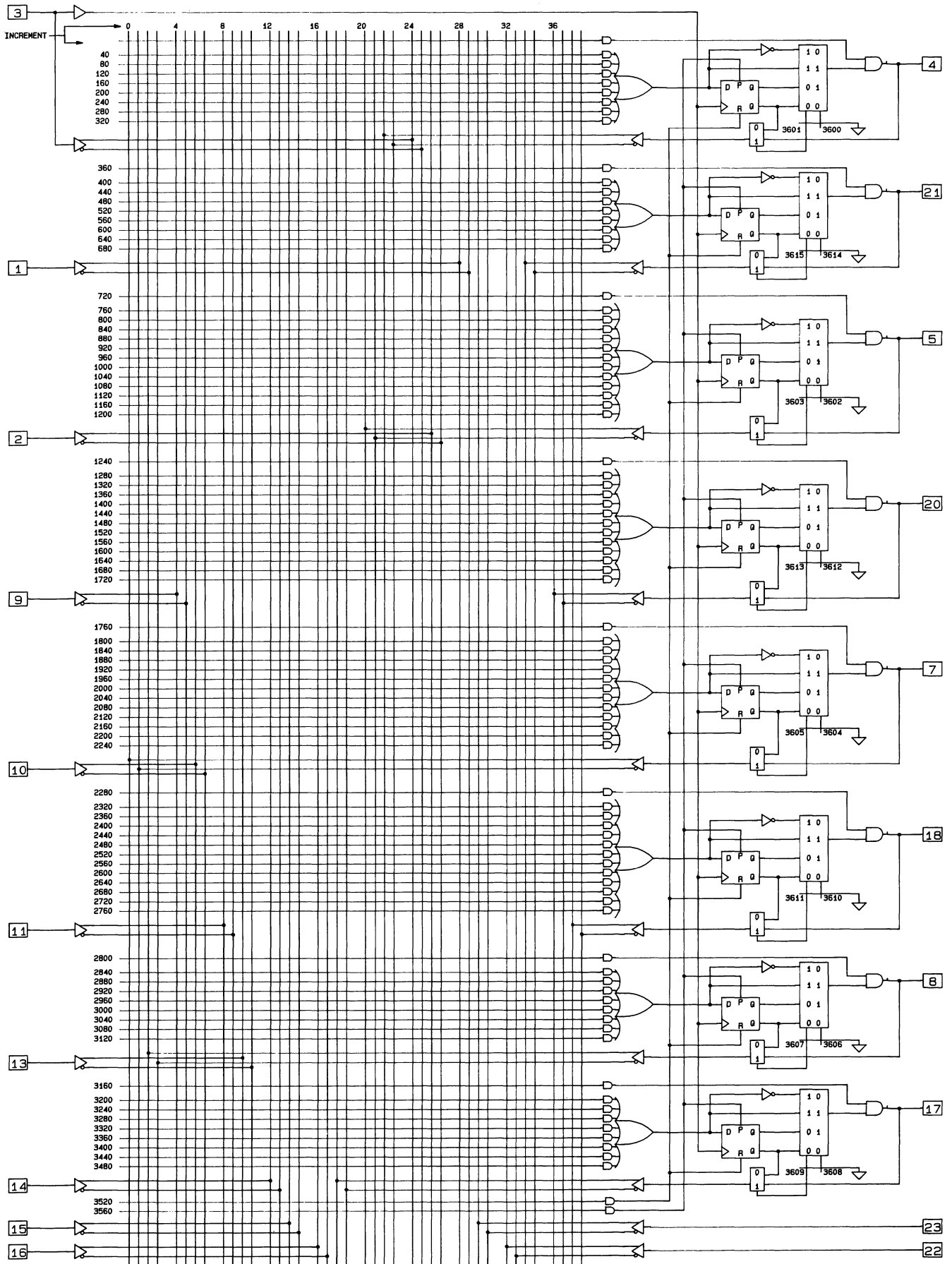


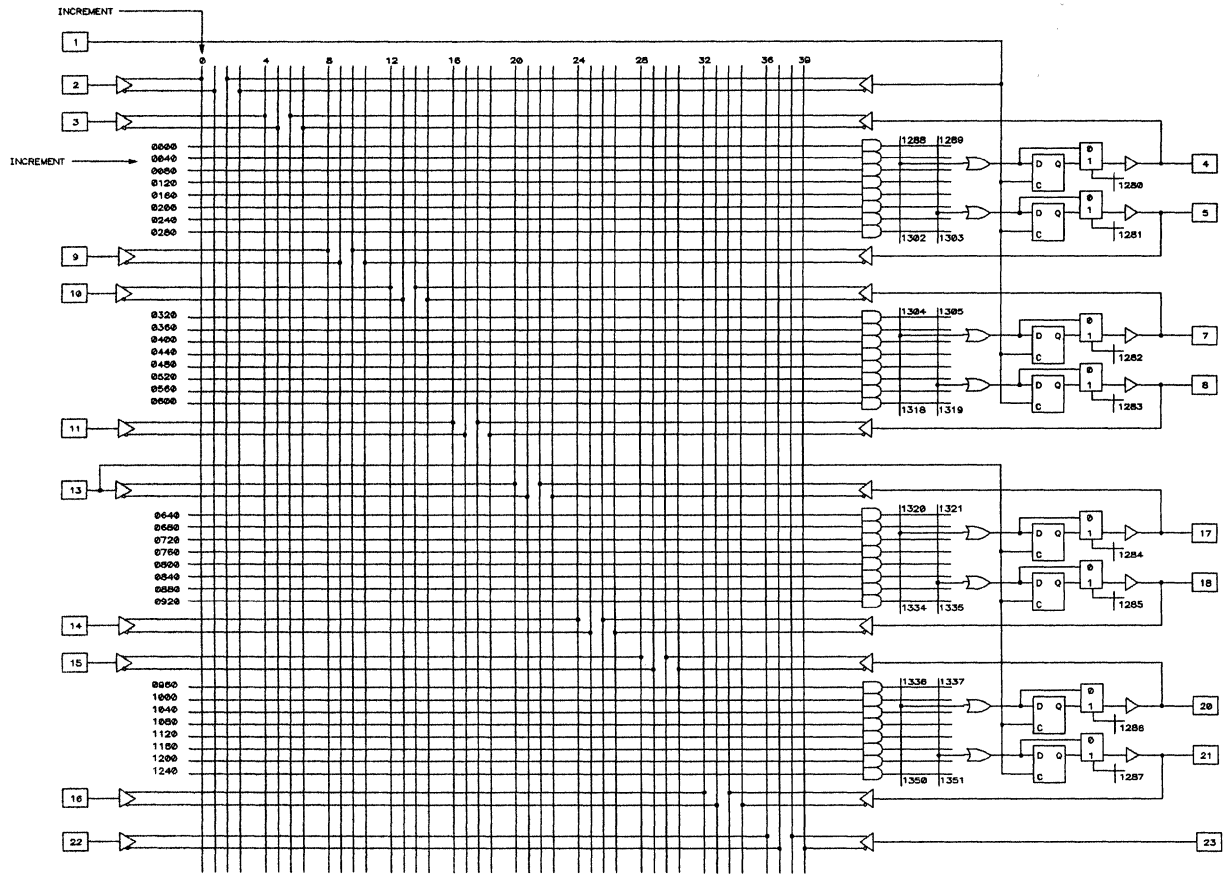


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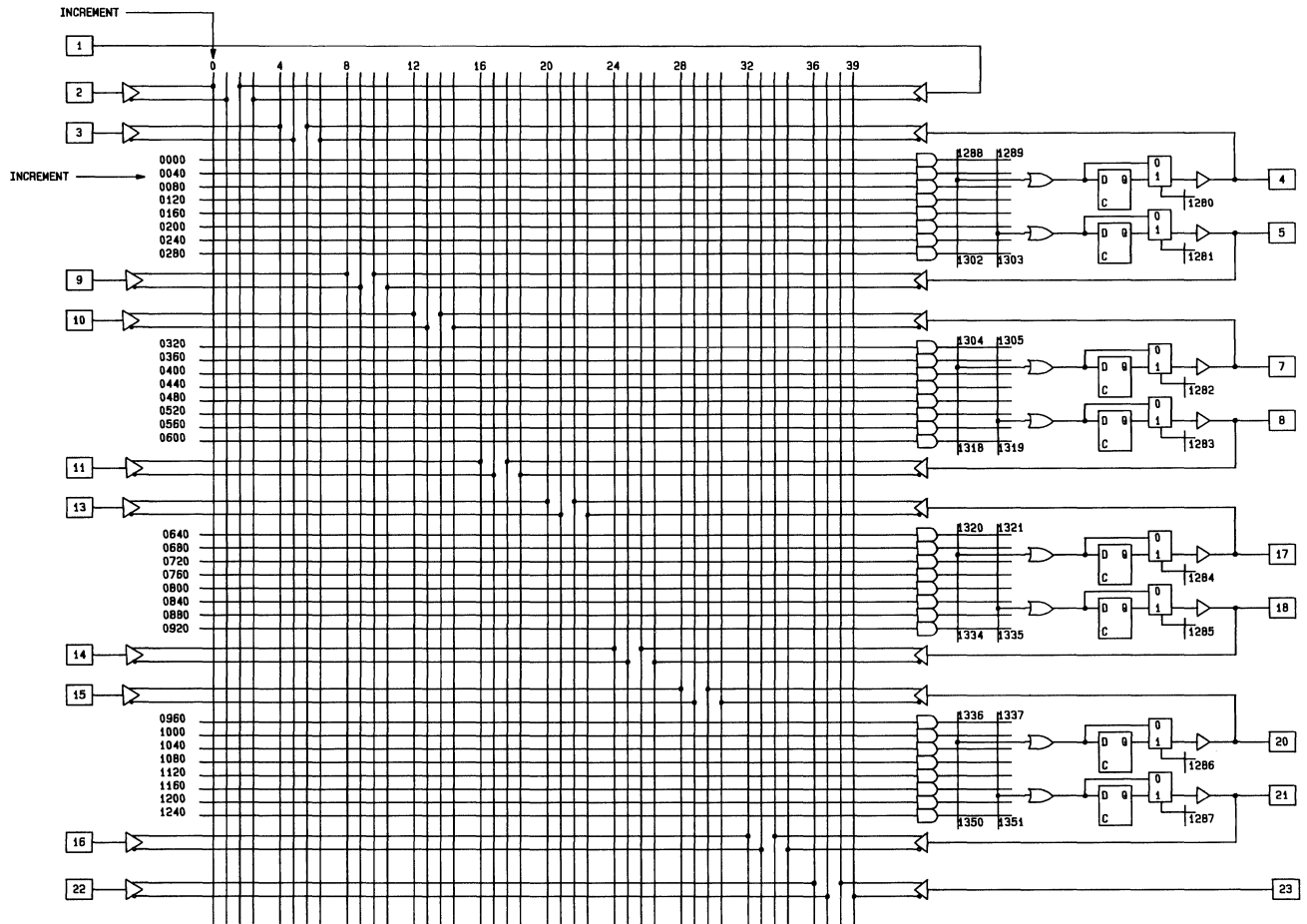
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Data I/O

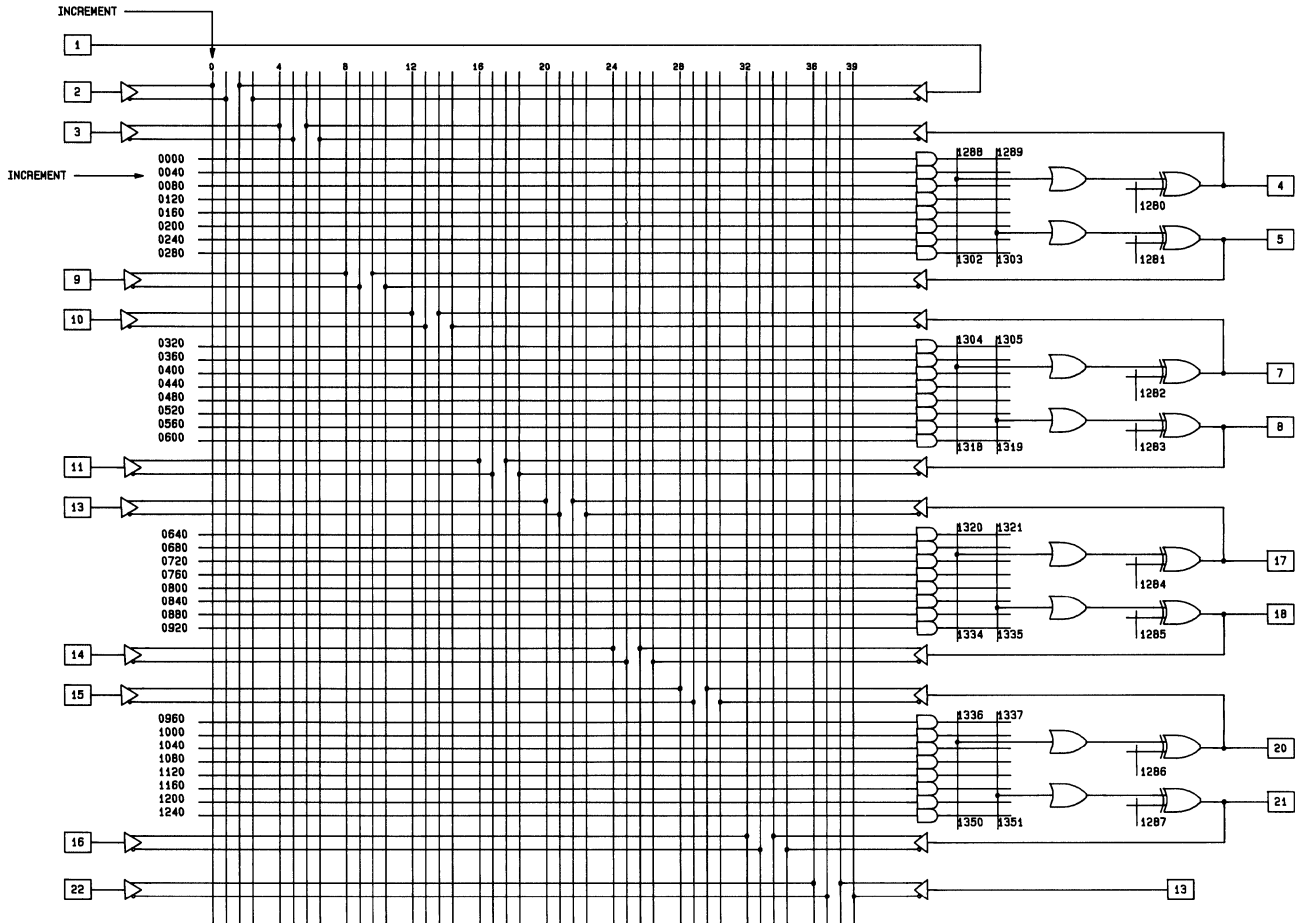


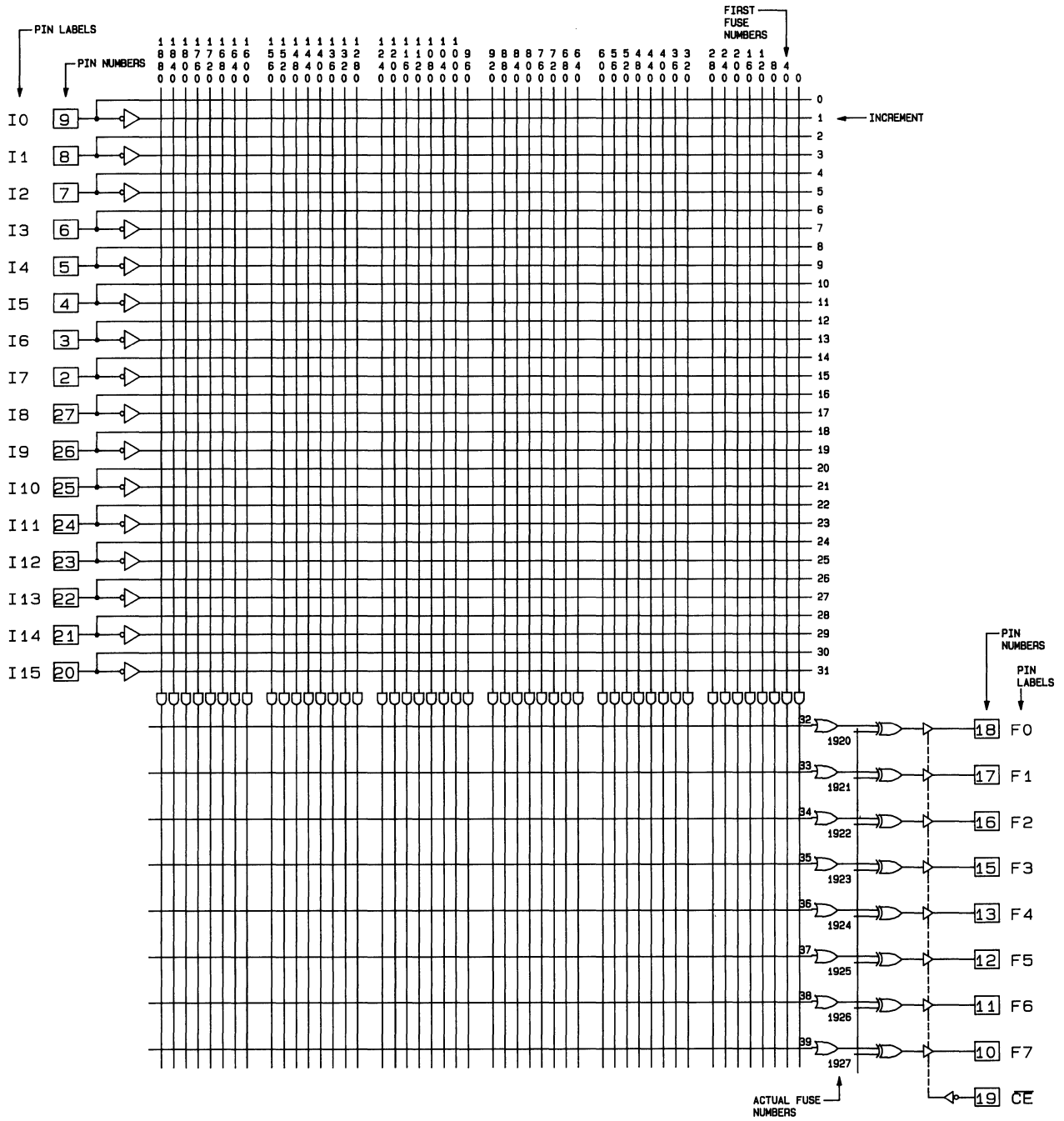


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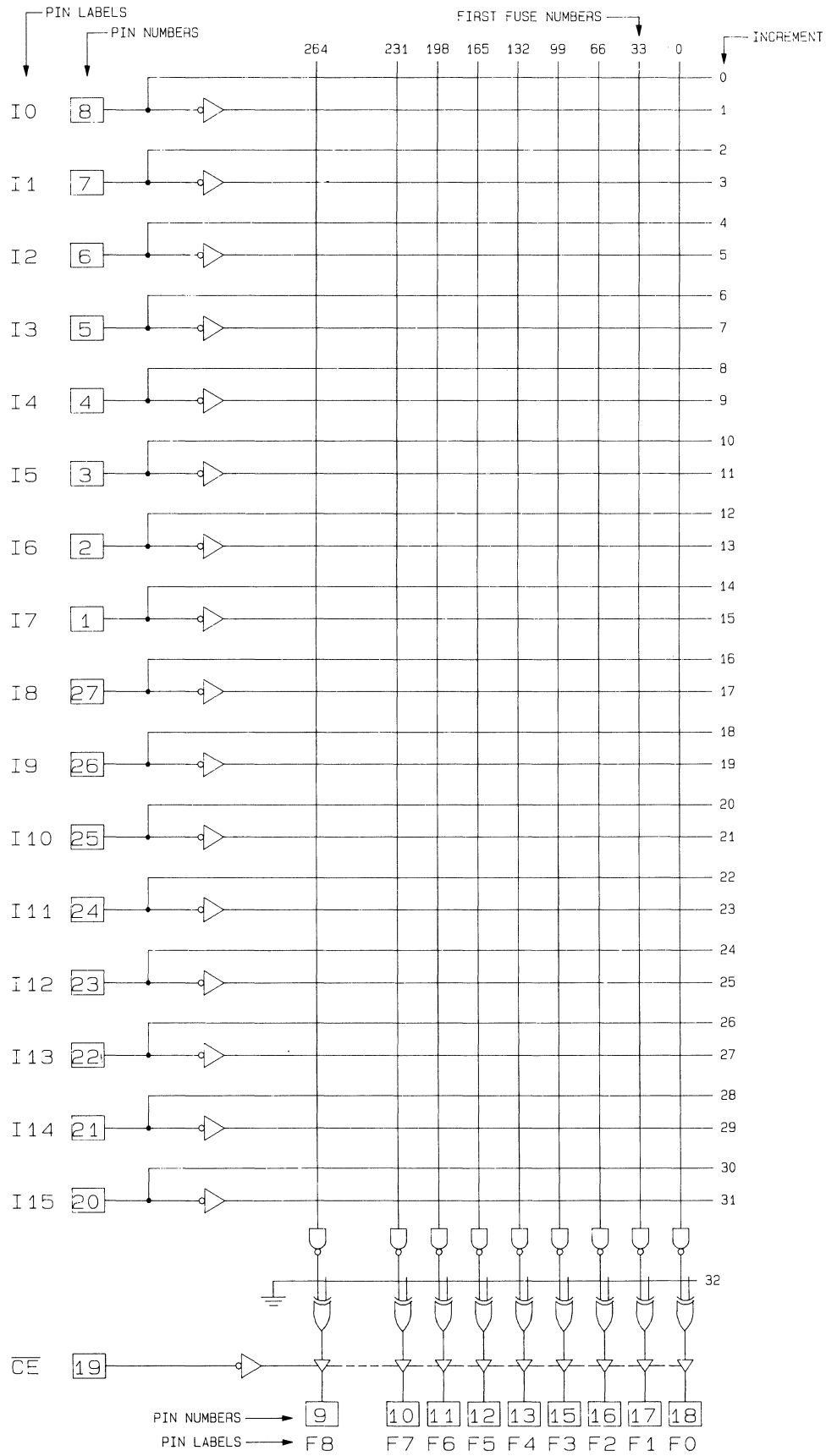
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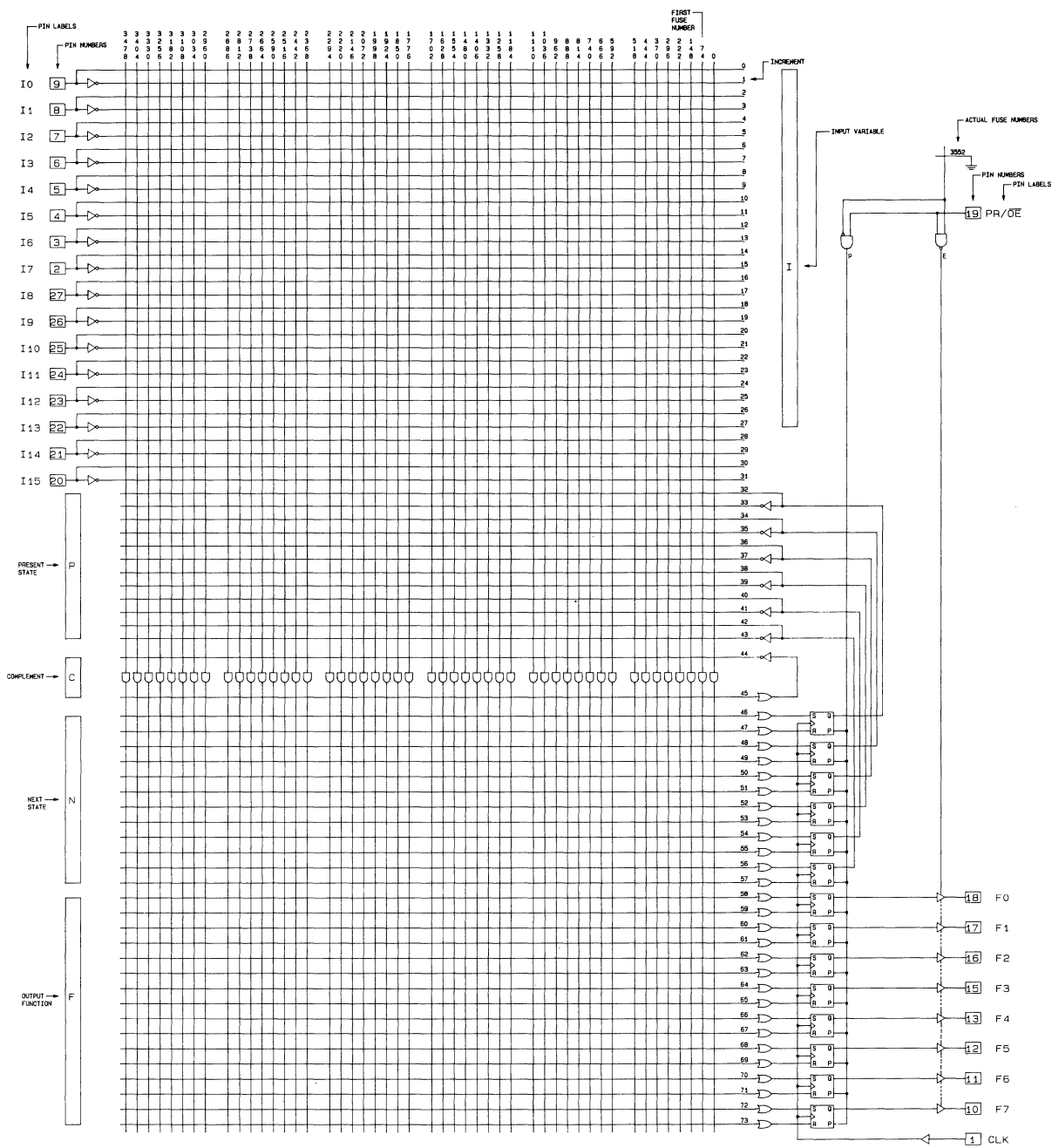


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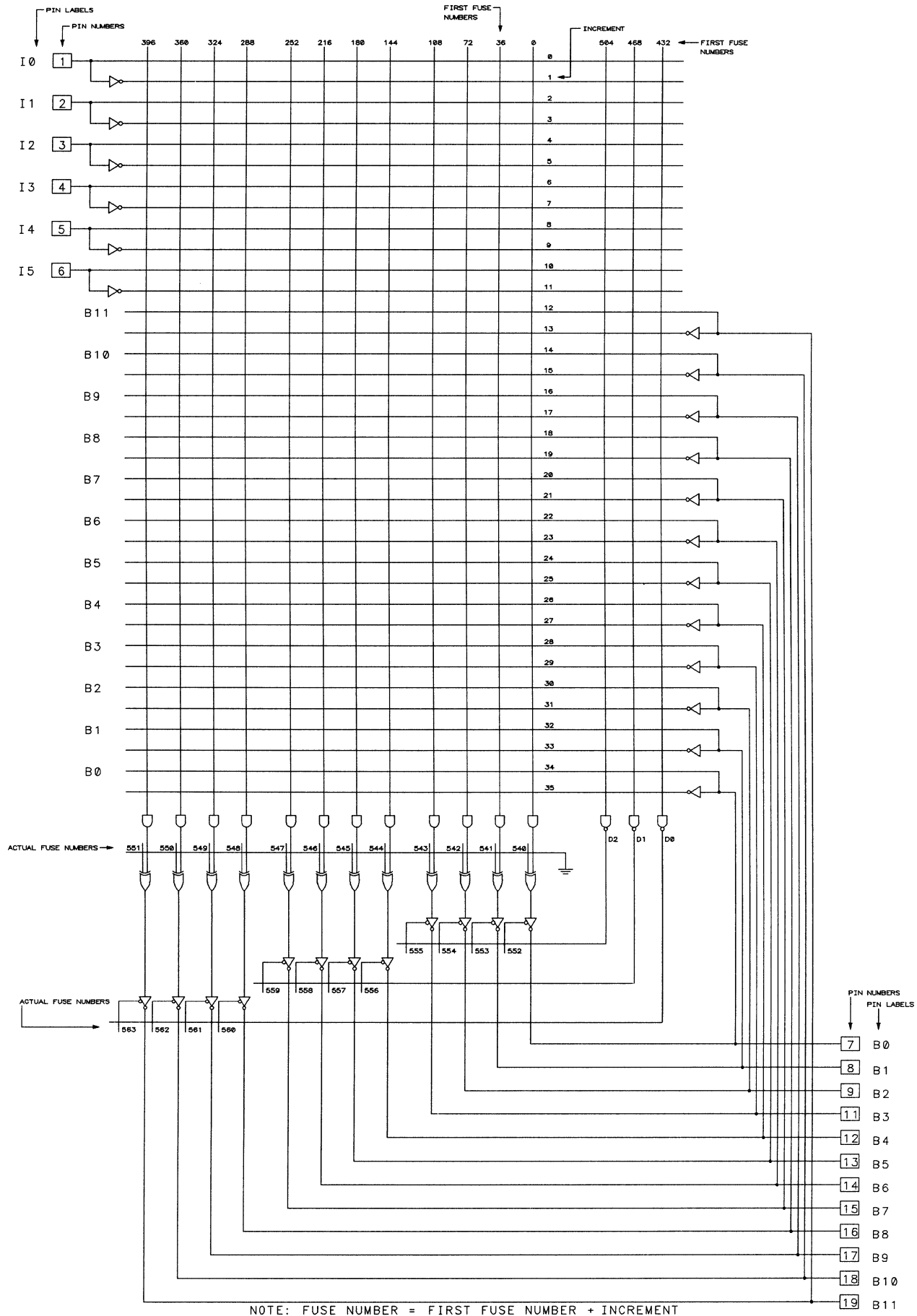


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

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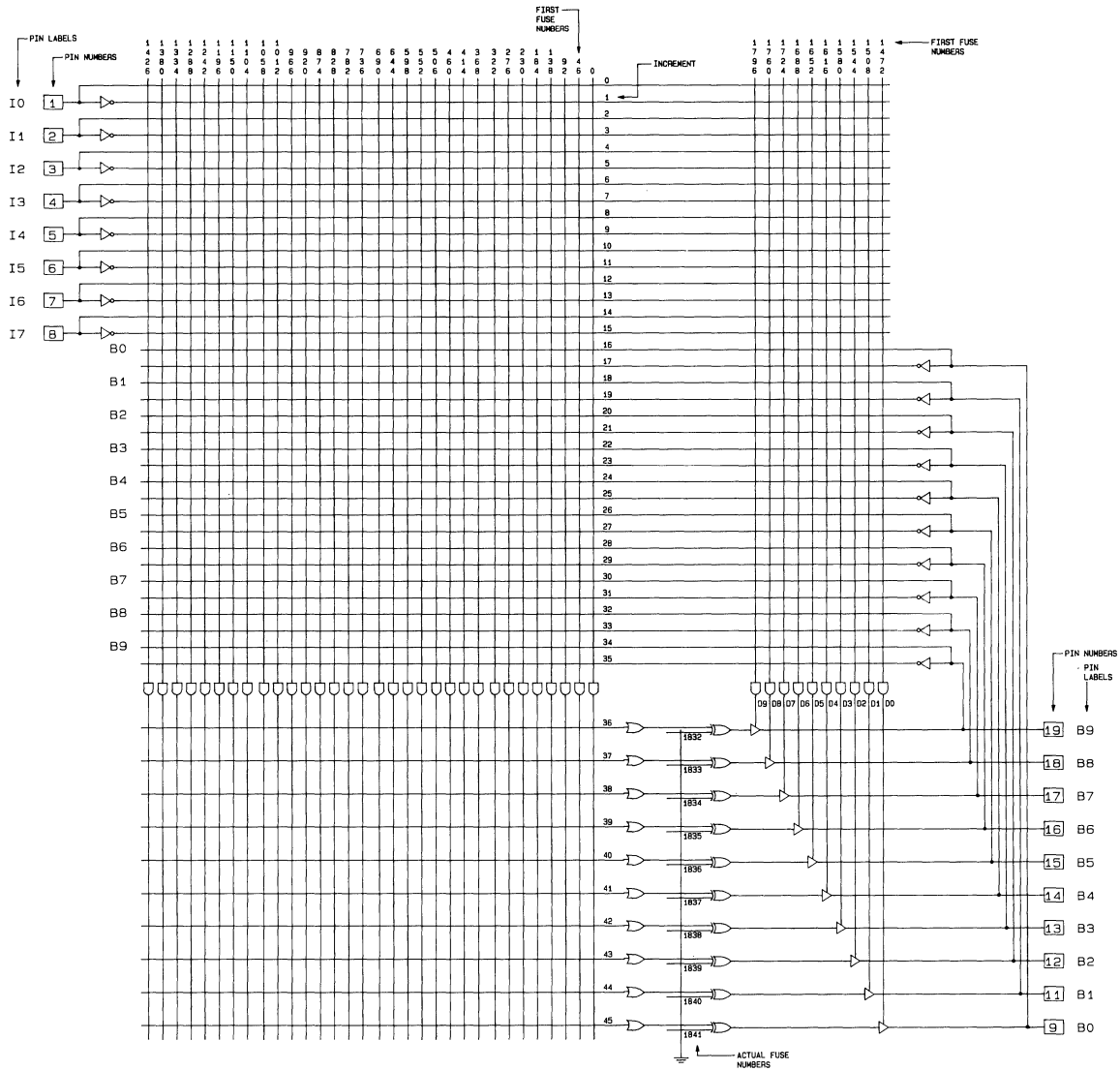


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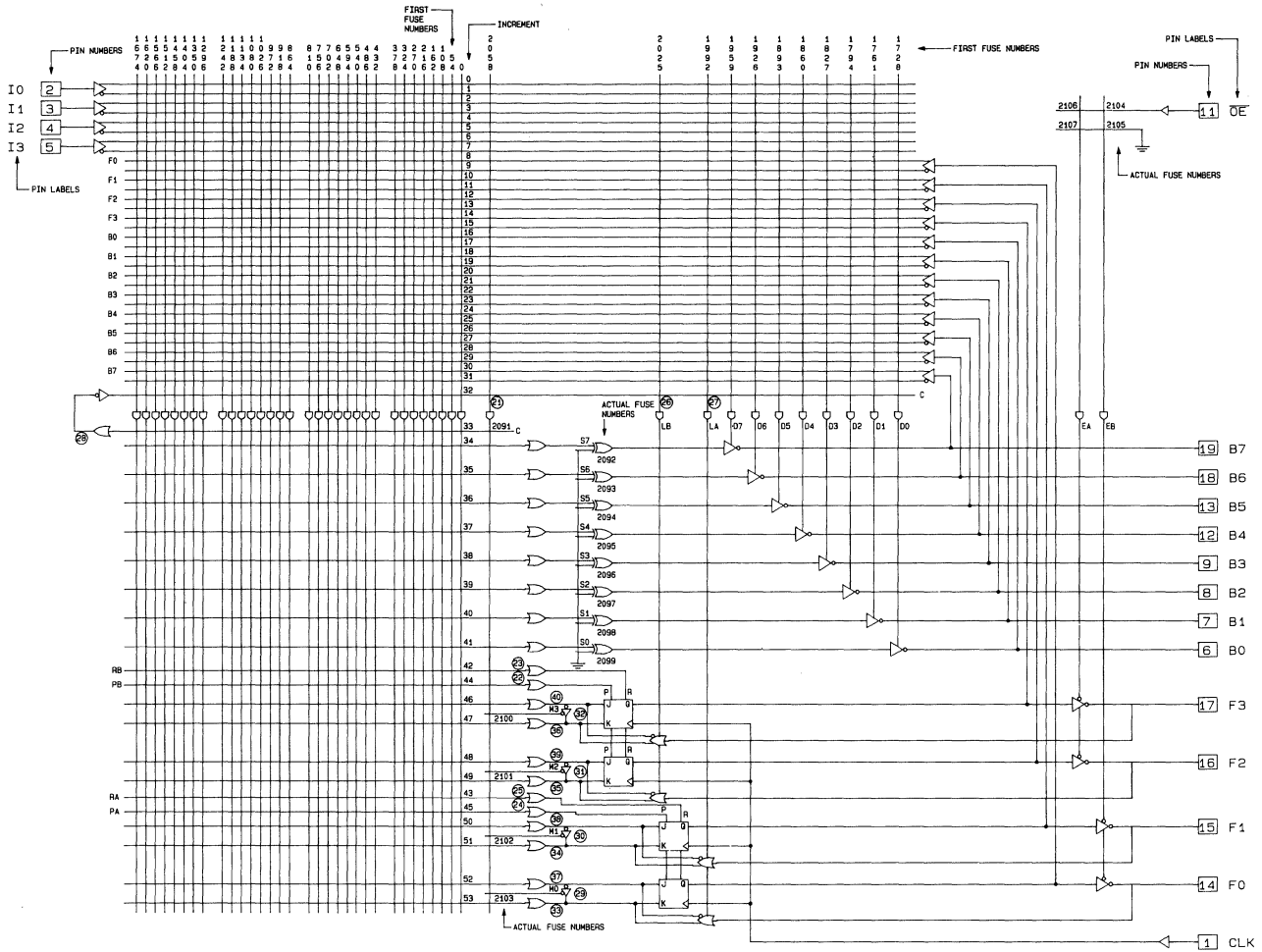




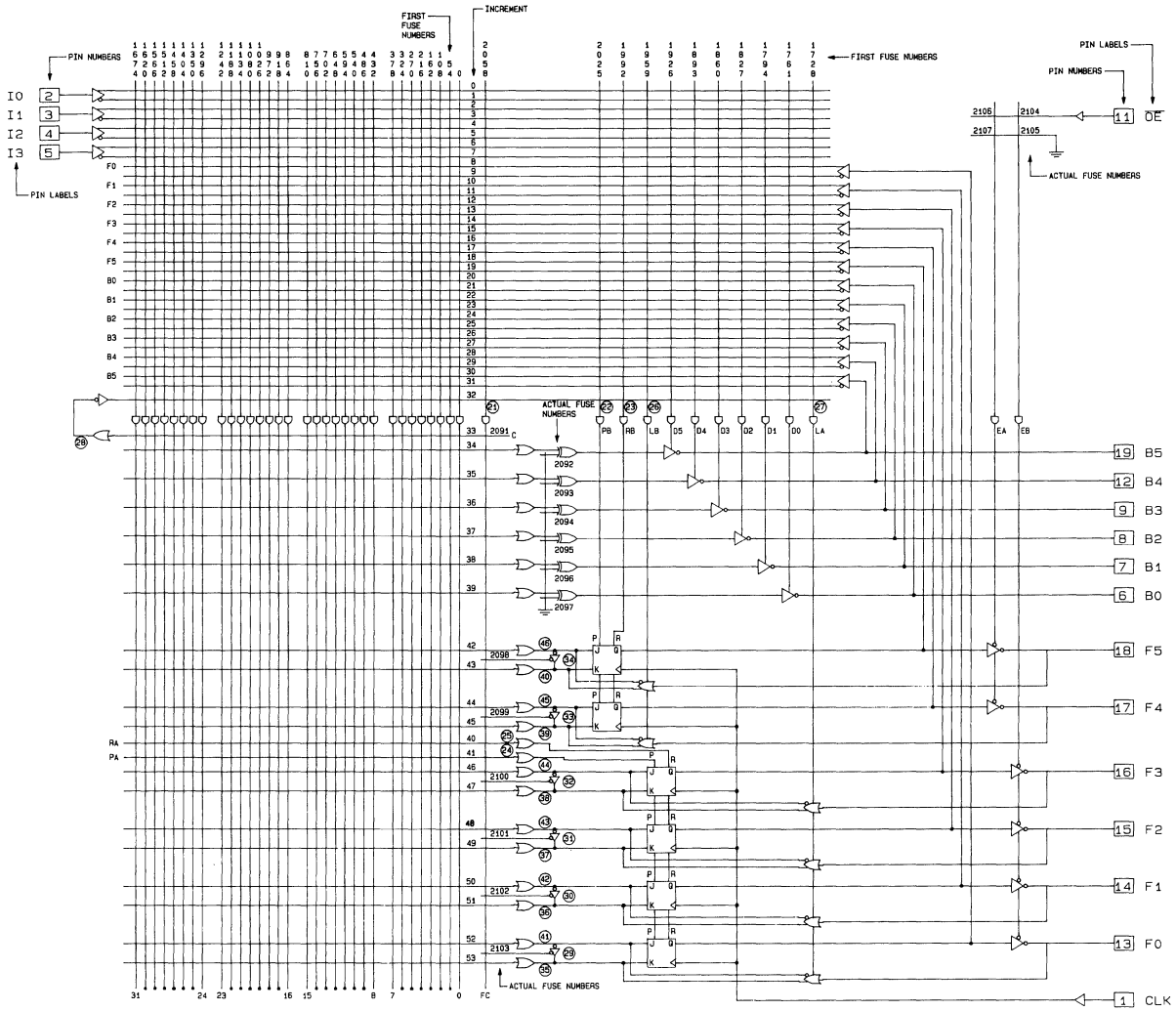
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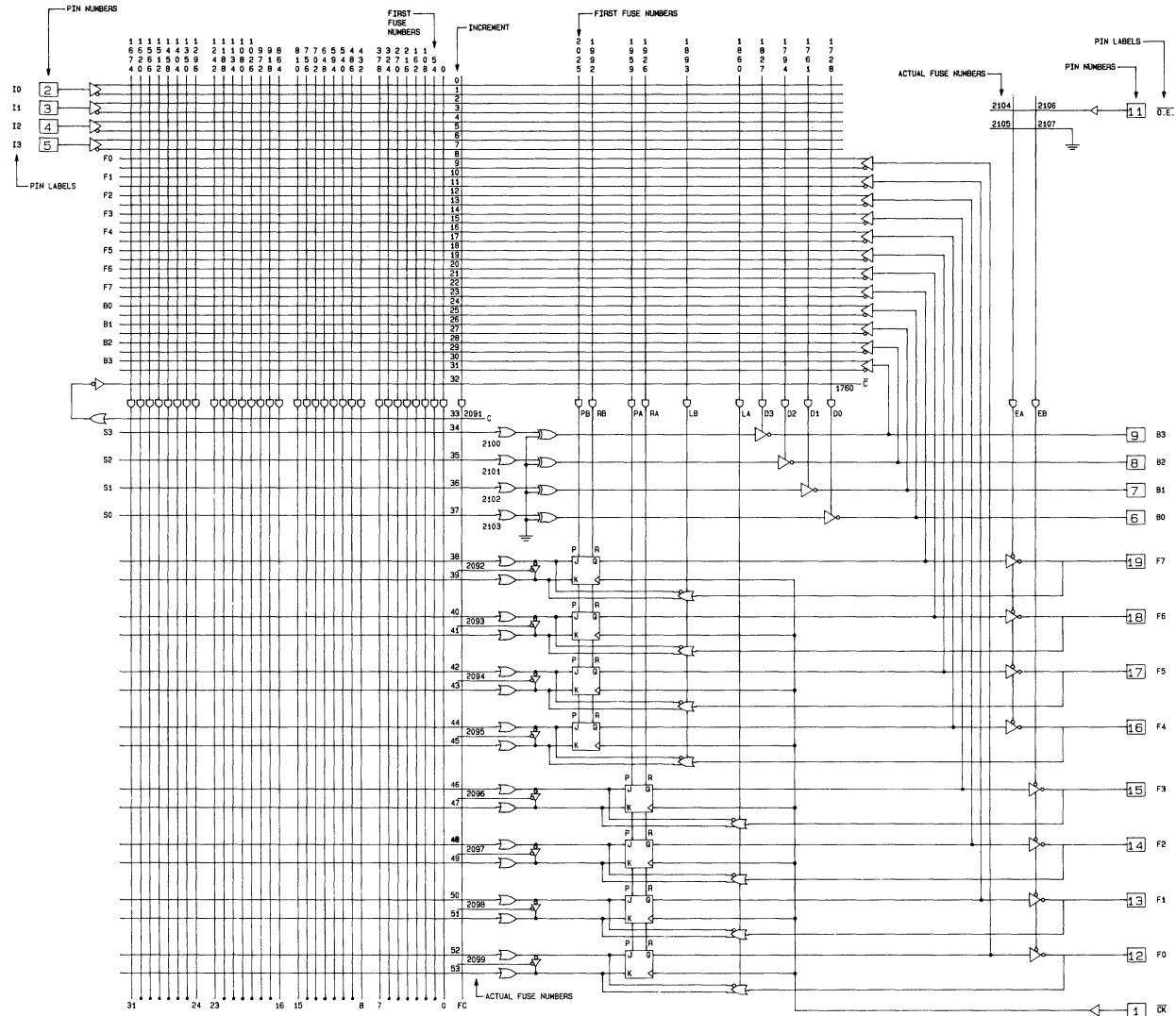
NOTE: FIRST FUSE = FIRST FUSE NUMBER + INCREMENT



- NOTES:
1. ALL OR GATE INPUTS WITH A BLOWN LINK FLOAT TO LOGIC "0"
  2. ALL OTHER GATES AND CONTROL INPUTS WITH A BLOWN LINK FLOAT TO LOGIC "1"
  3. ○ DENOTES NODE NUMBER
  4. FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT



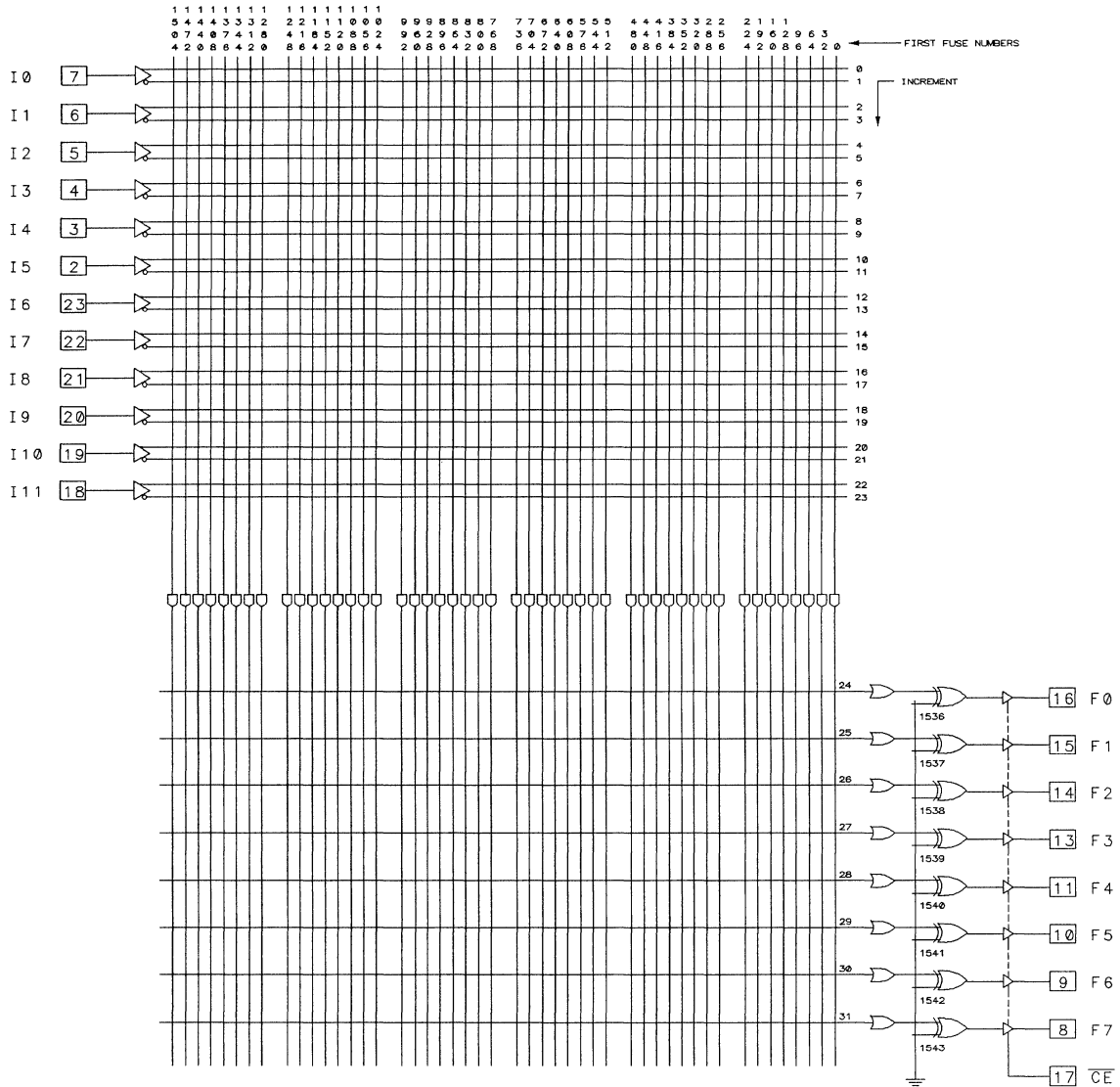
NOTES:  
 1. ALL OR GATE INPUTS WITH A BLOWN LINK FLOAT TO LOGIC "0"  
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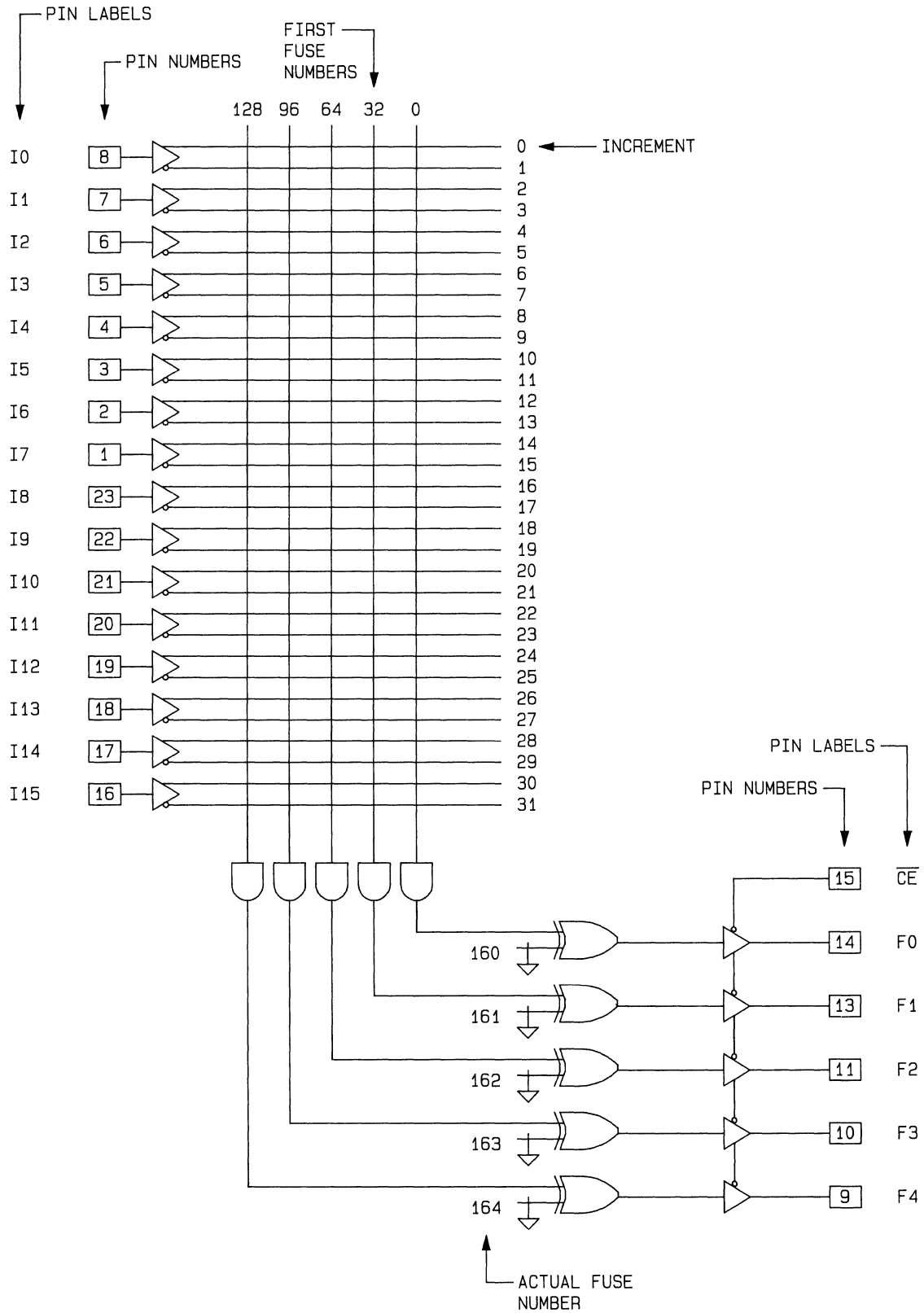


NOTES:  
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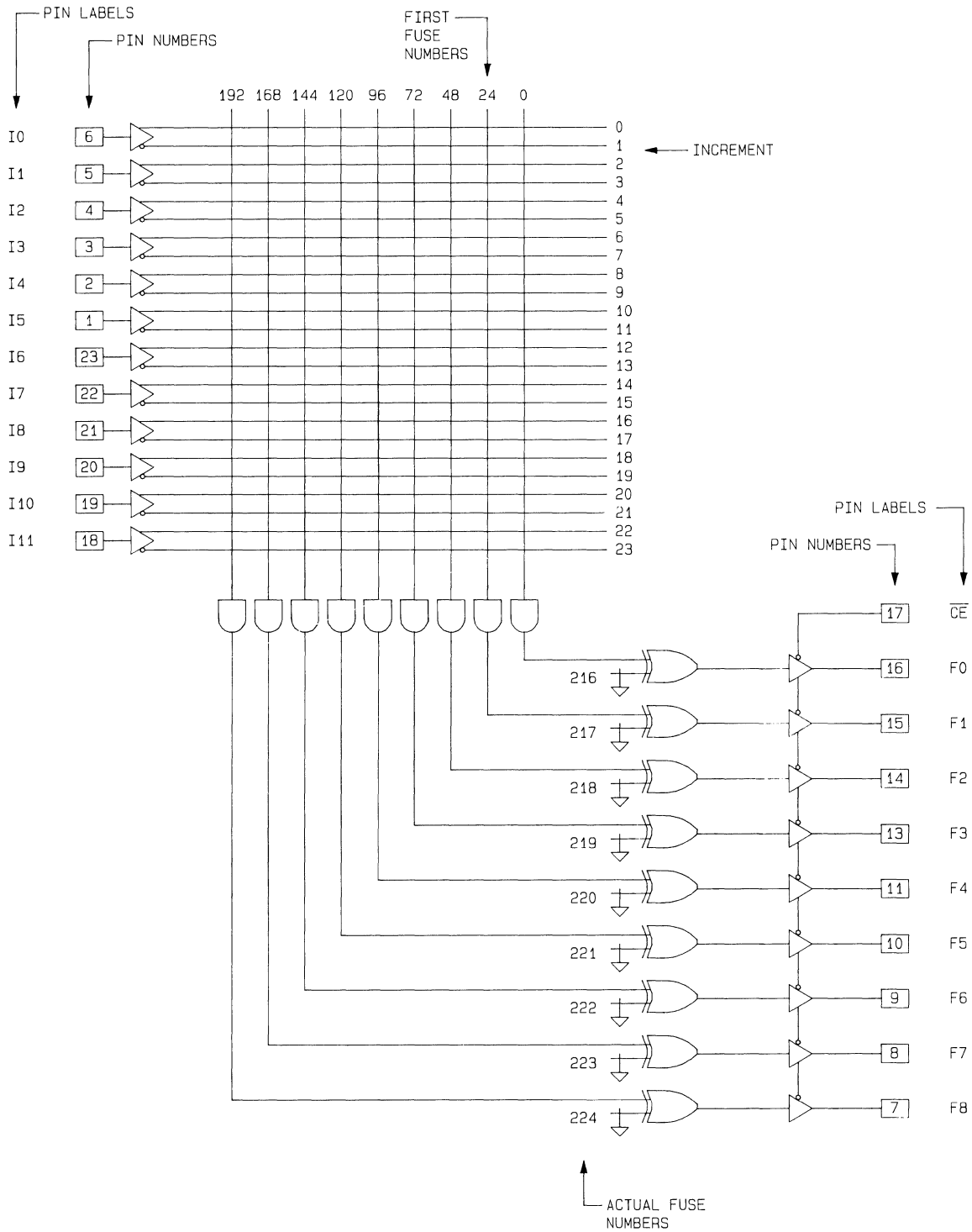
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Data I/O Corporation

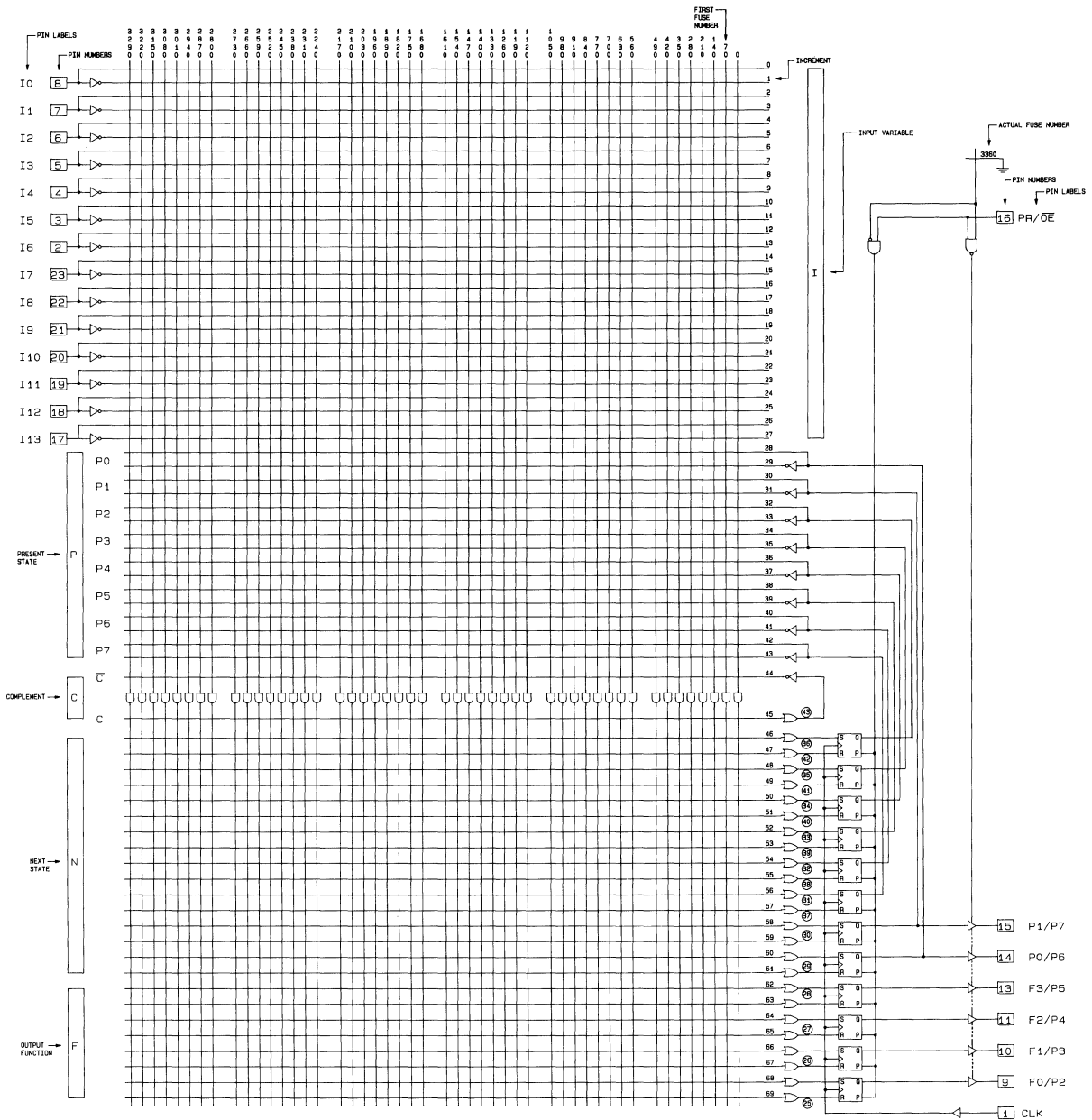




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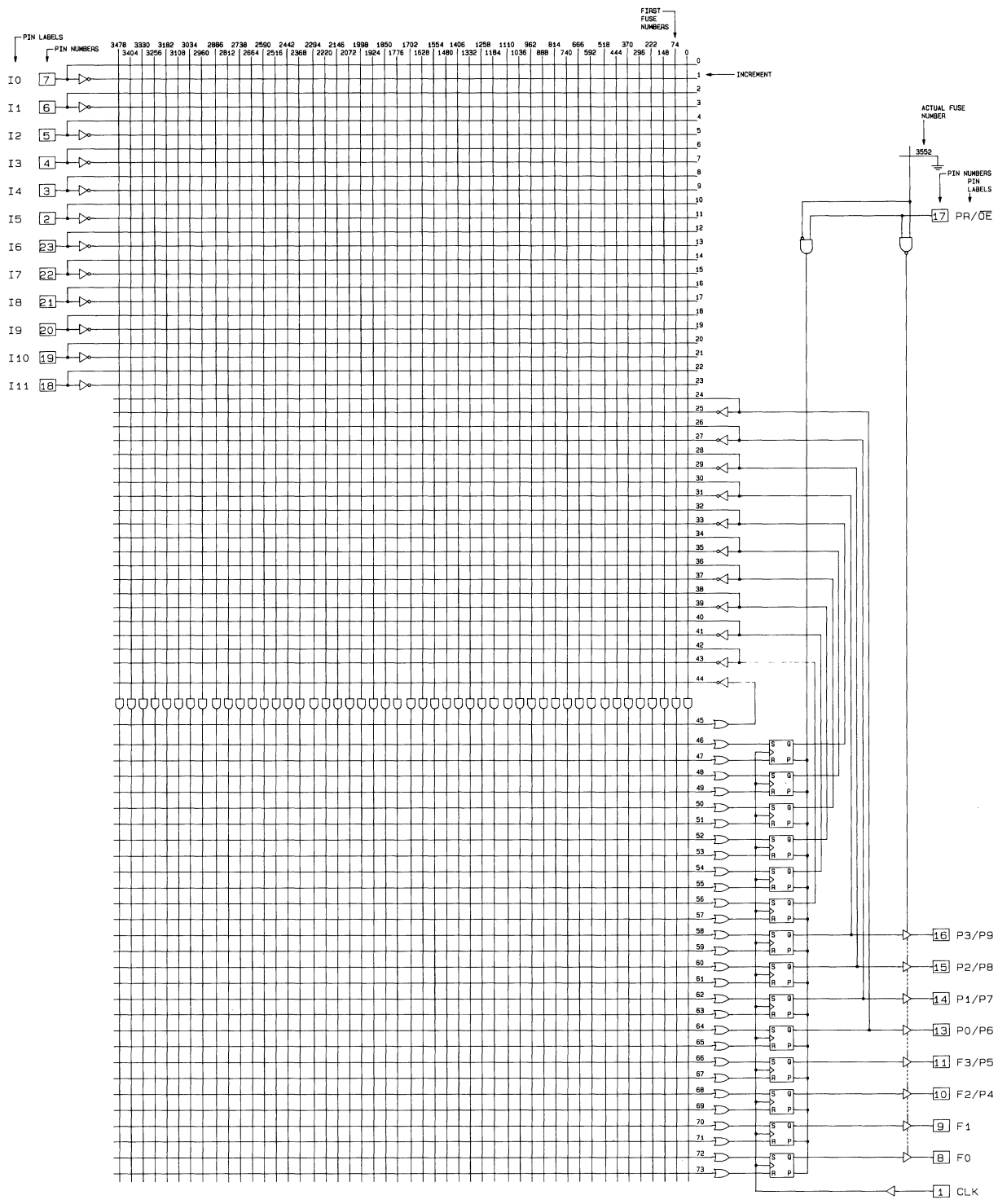
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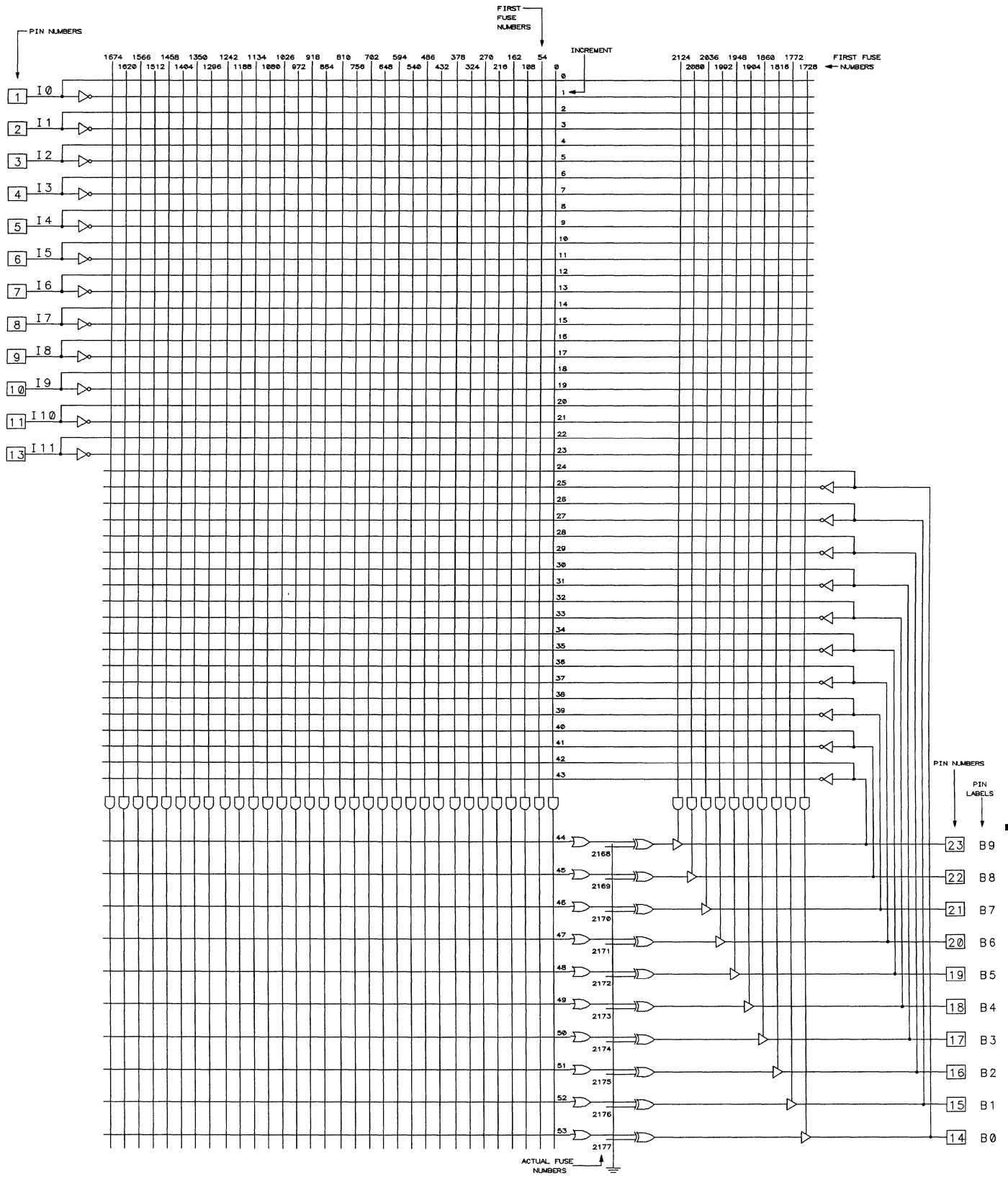


NOTES:  
 1. ALL AND GATE INPUTS WITH A BLOWN LINK FLOAT TO A LOGIC "1"  
 2. ALL OR GATE INPUTS WITH A BLOWN LINK FLOAT TO A LOGIC "0"  
 3. ○ DENOTES NODE NUMBER  
 4. FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT



Data I/O Corporation

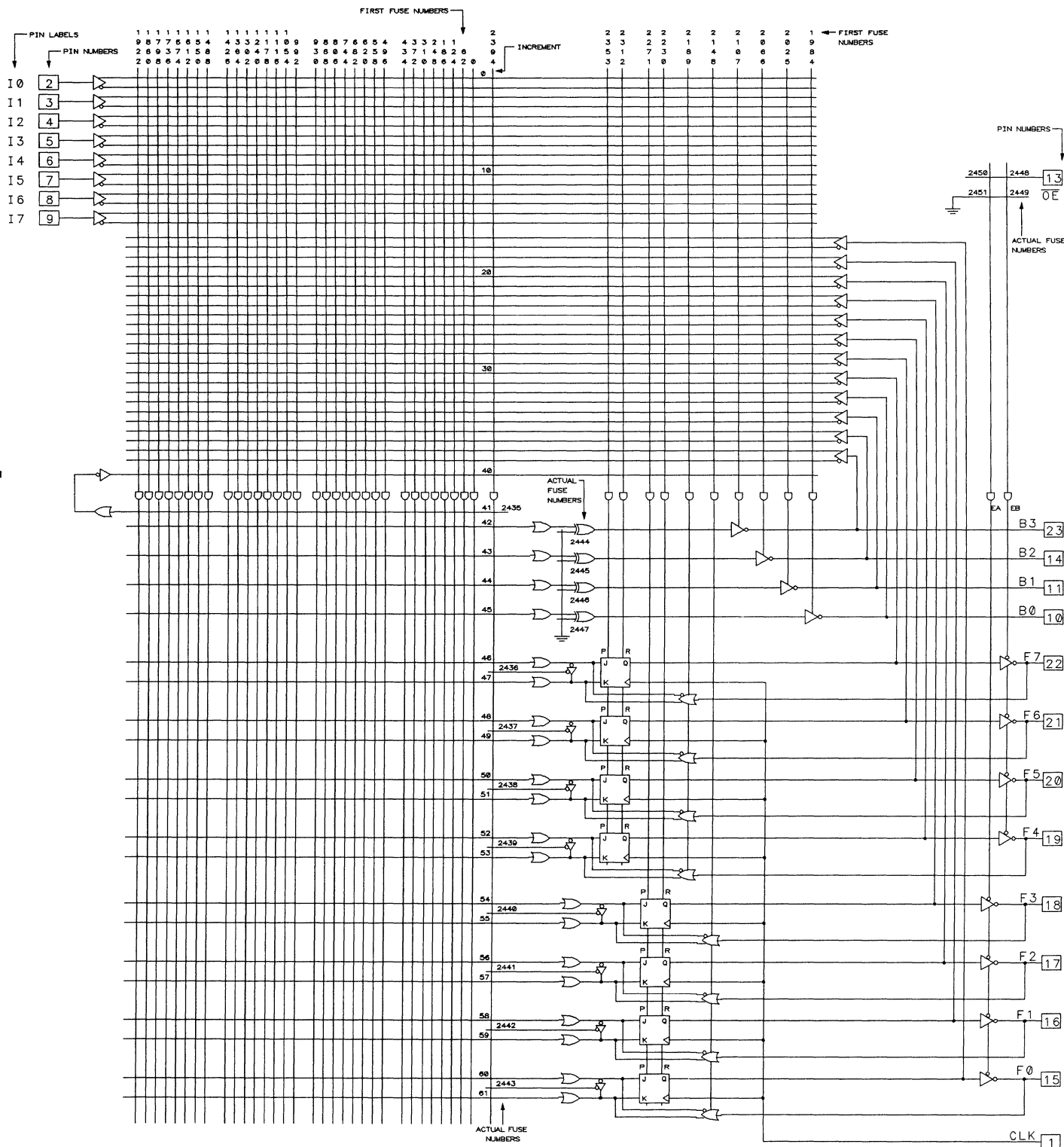




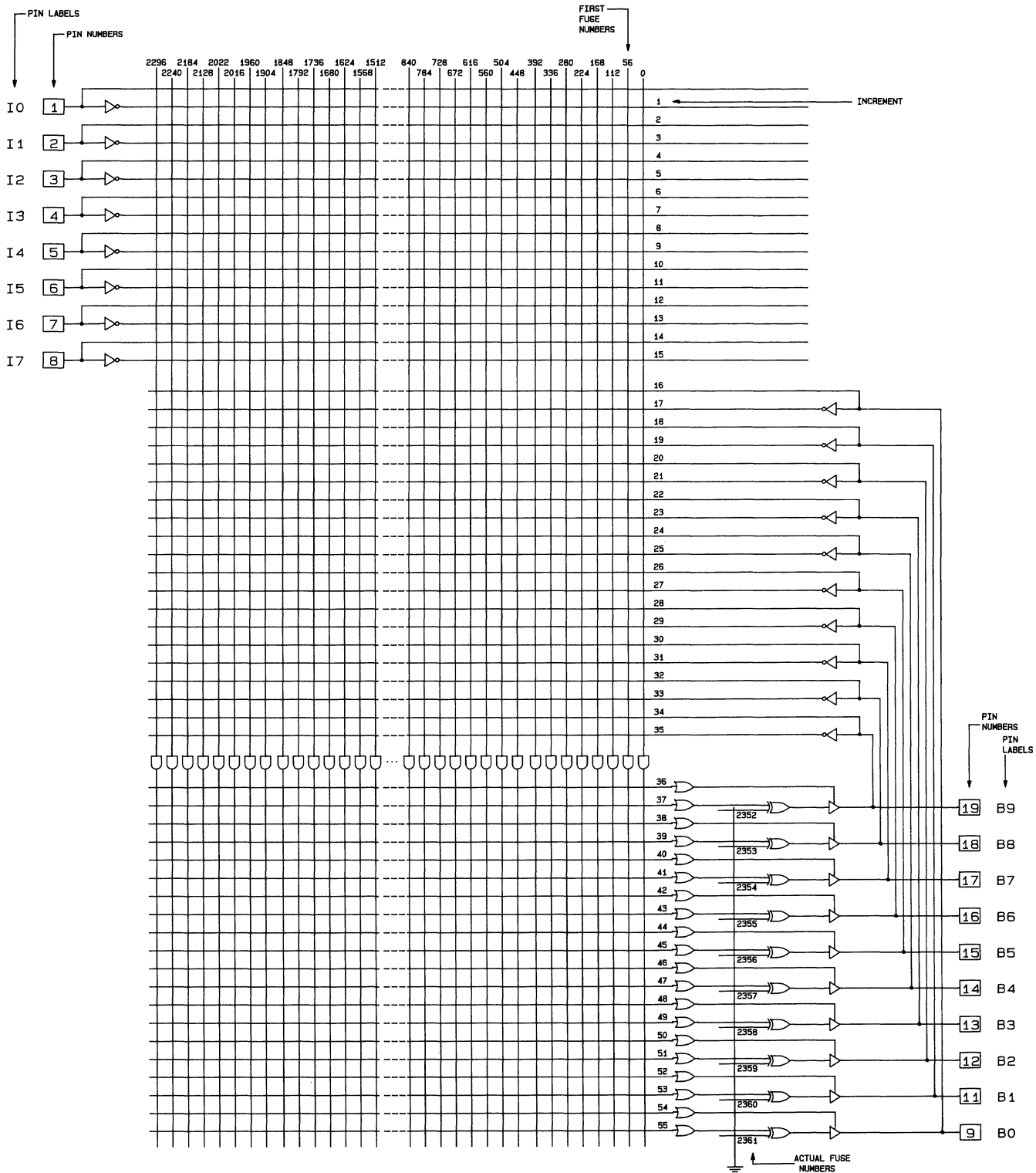
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Corporation

NOTE: FIRST FUSE = FIRST FUSE NUMBER + INCREMENT

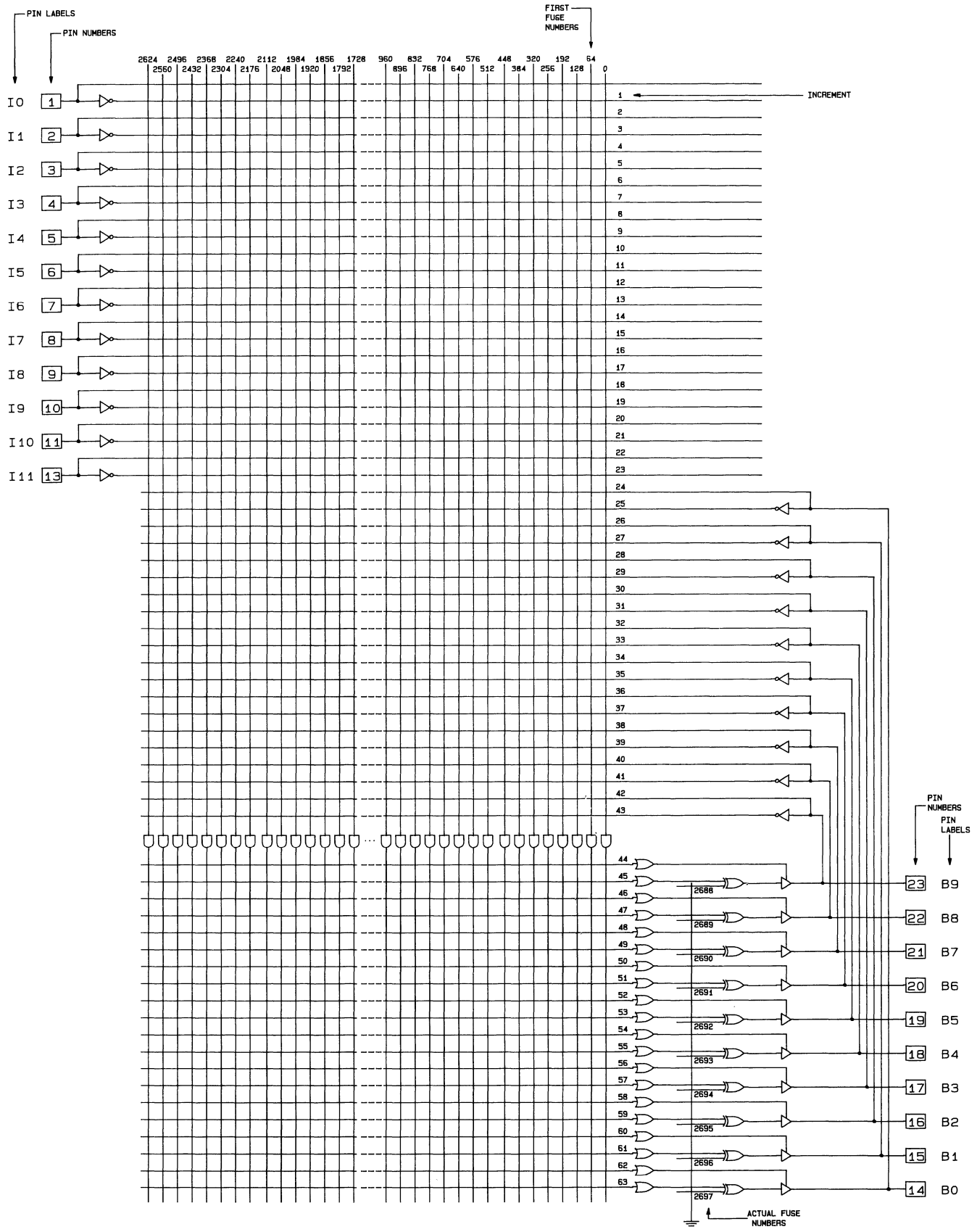


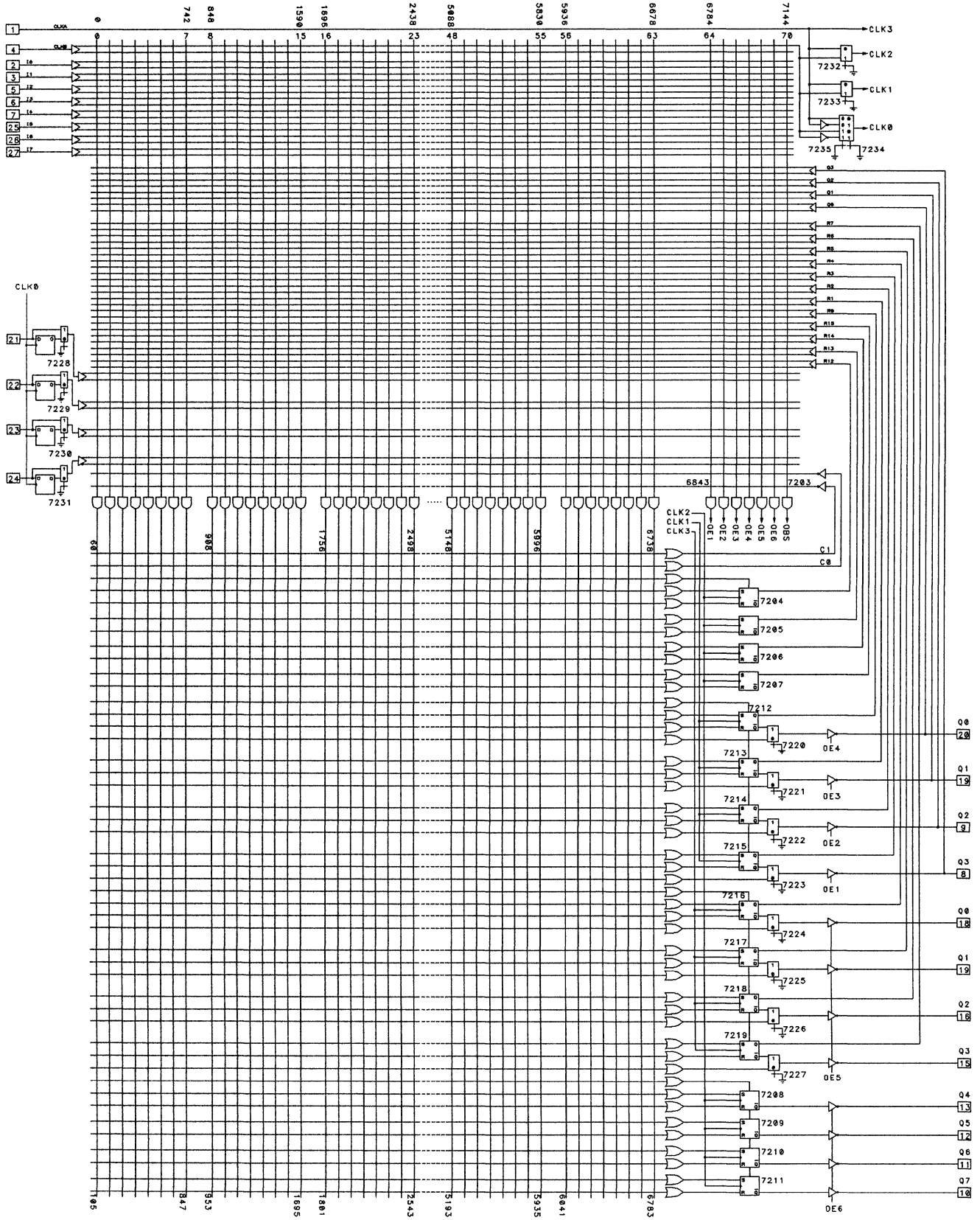
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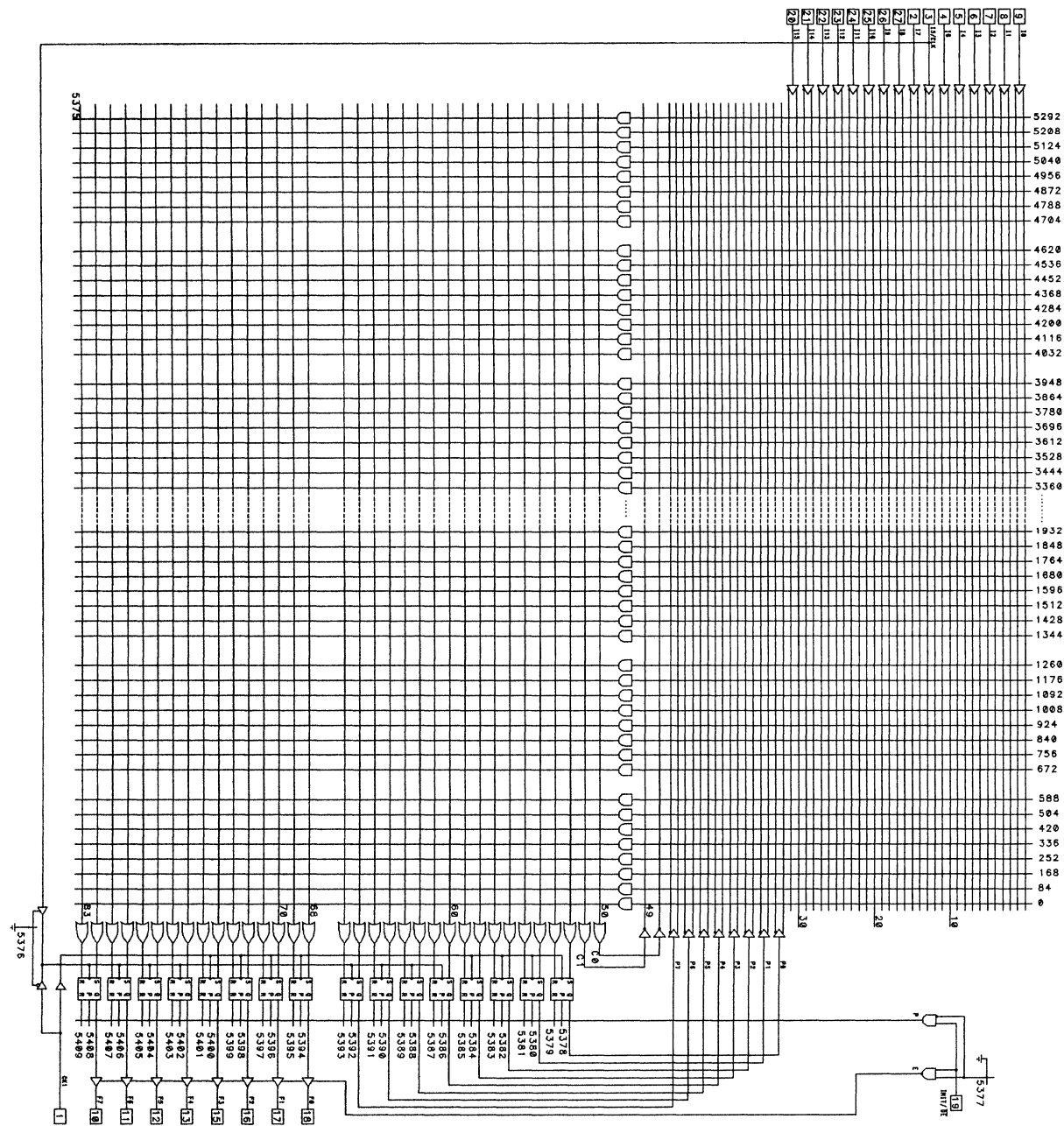
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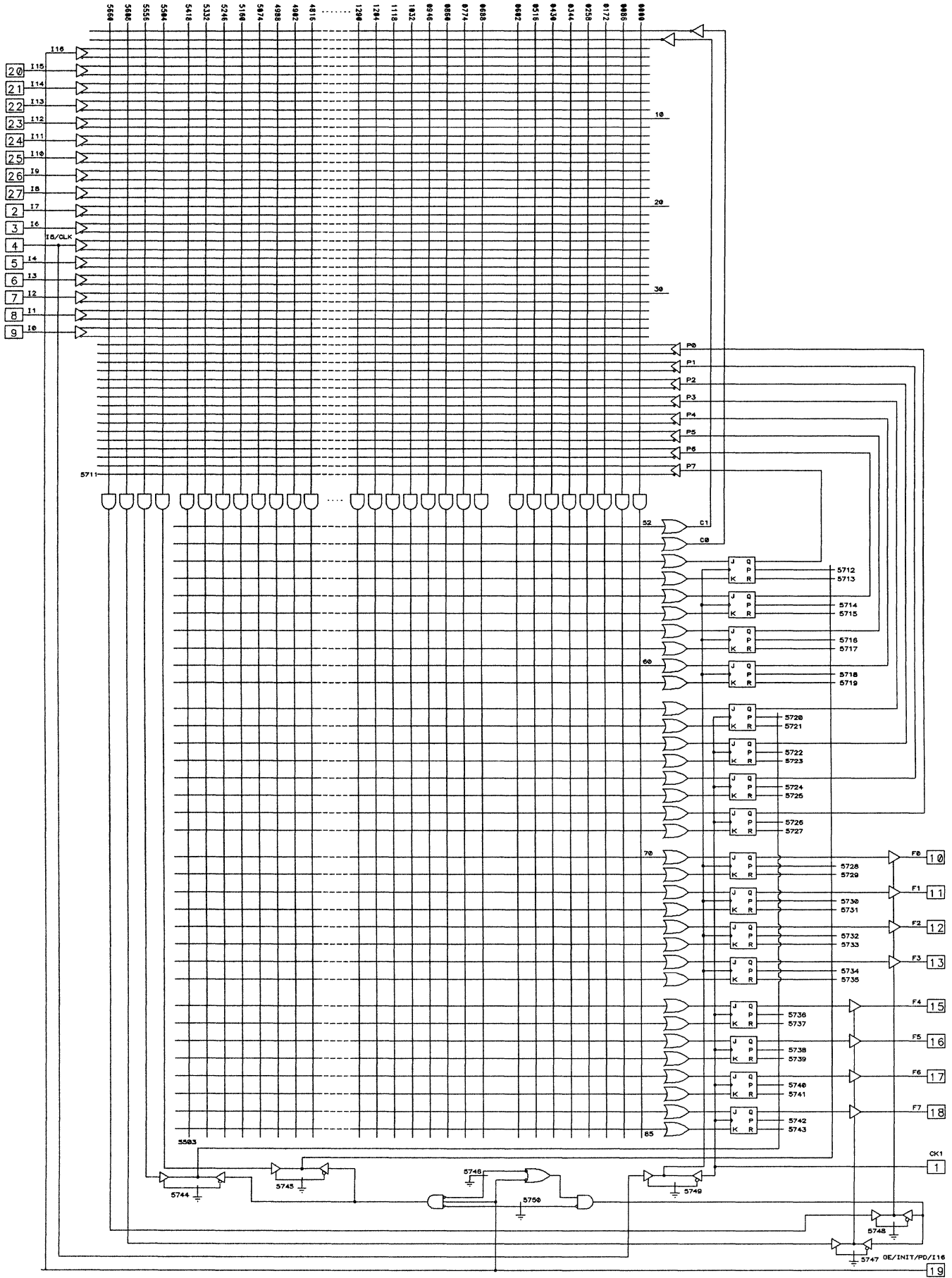
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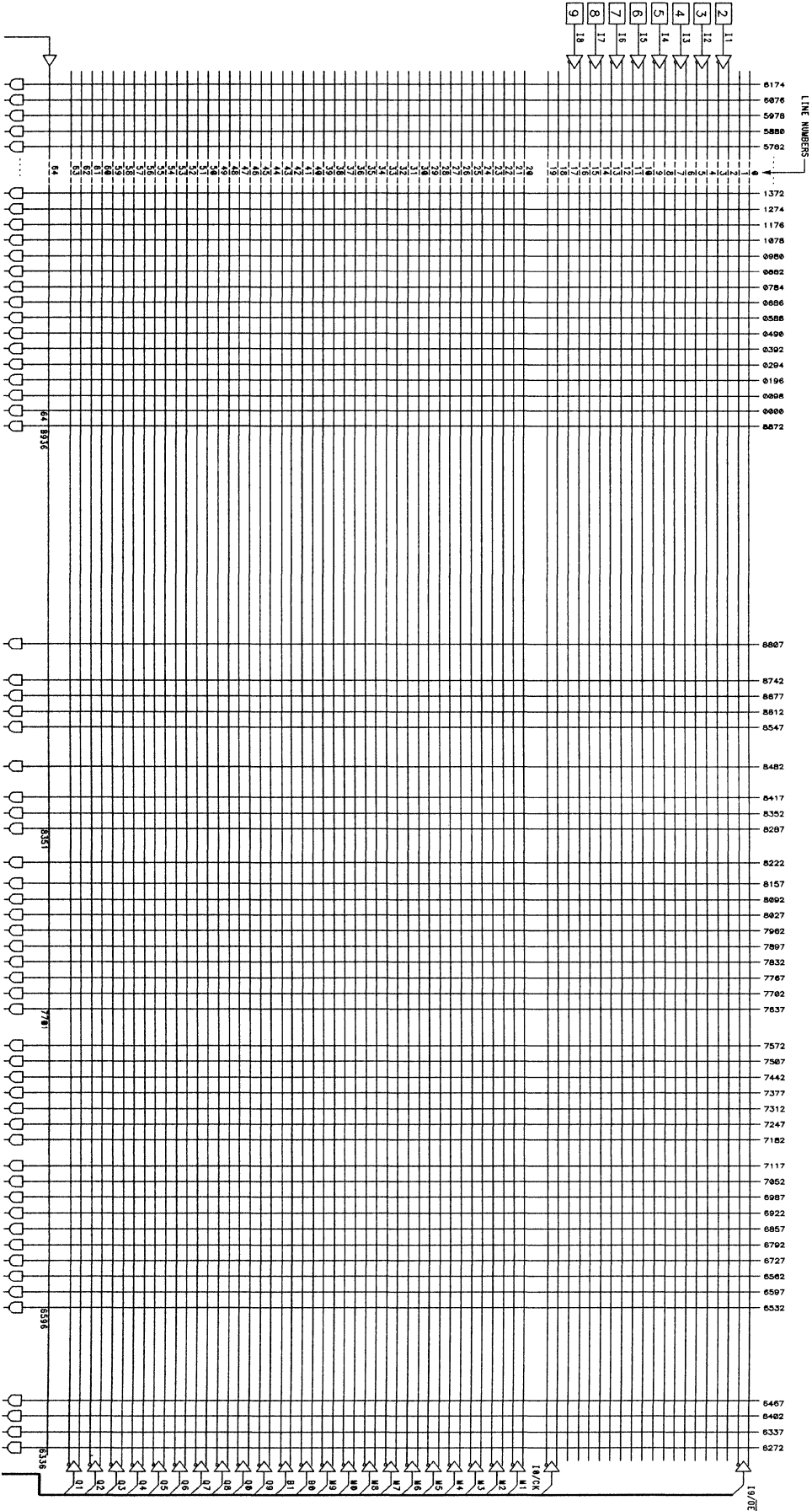
# Data I/O Corporation





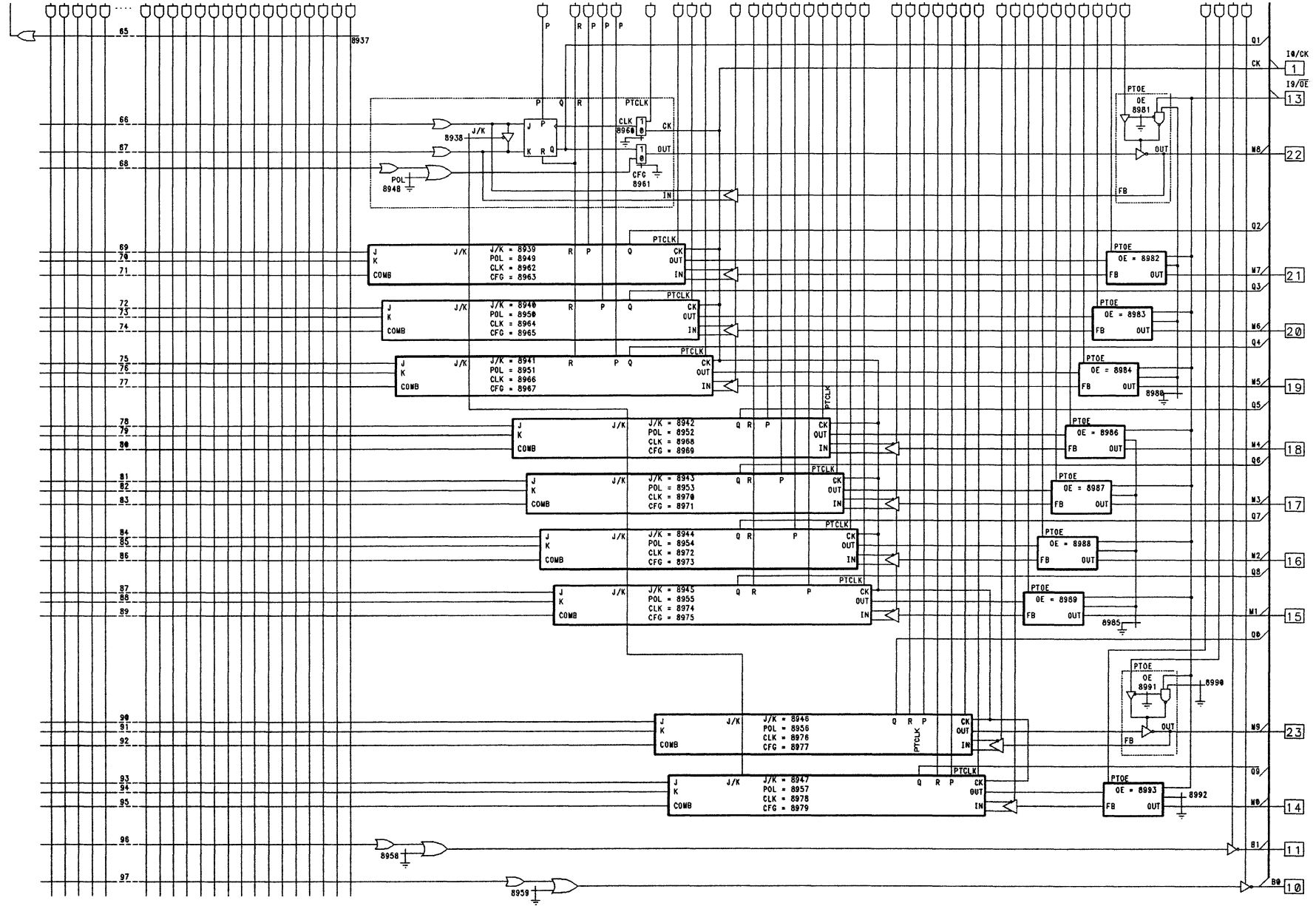


Data I/O Corporation



# Data I/O Corporation

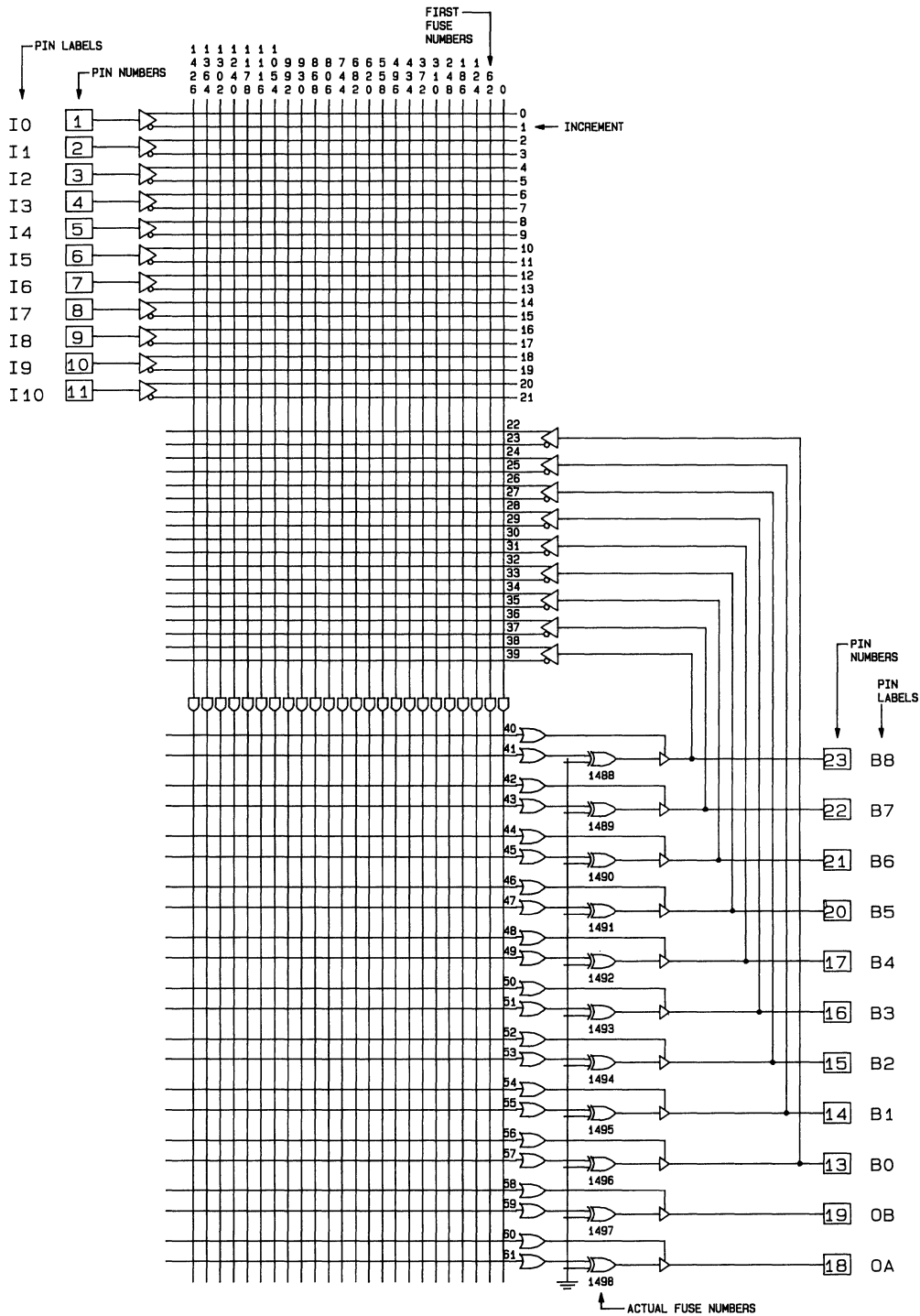
F42VA12 (2 of 2)



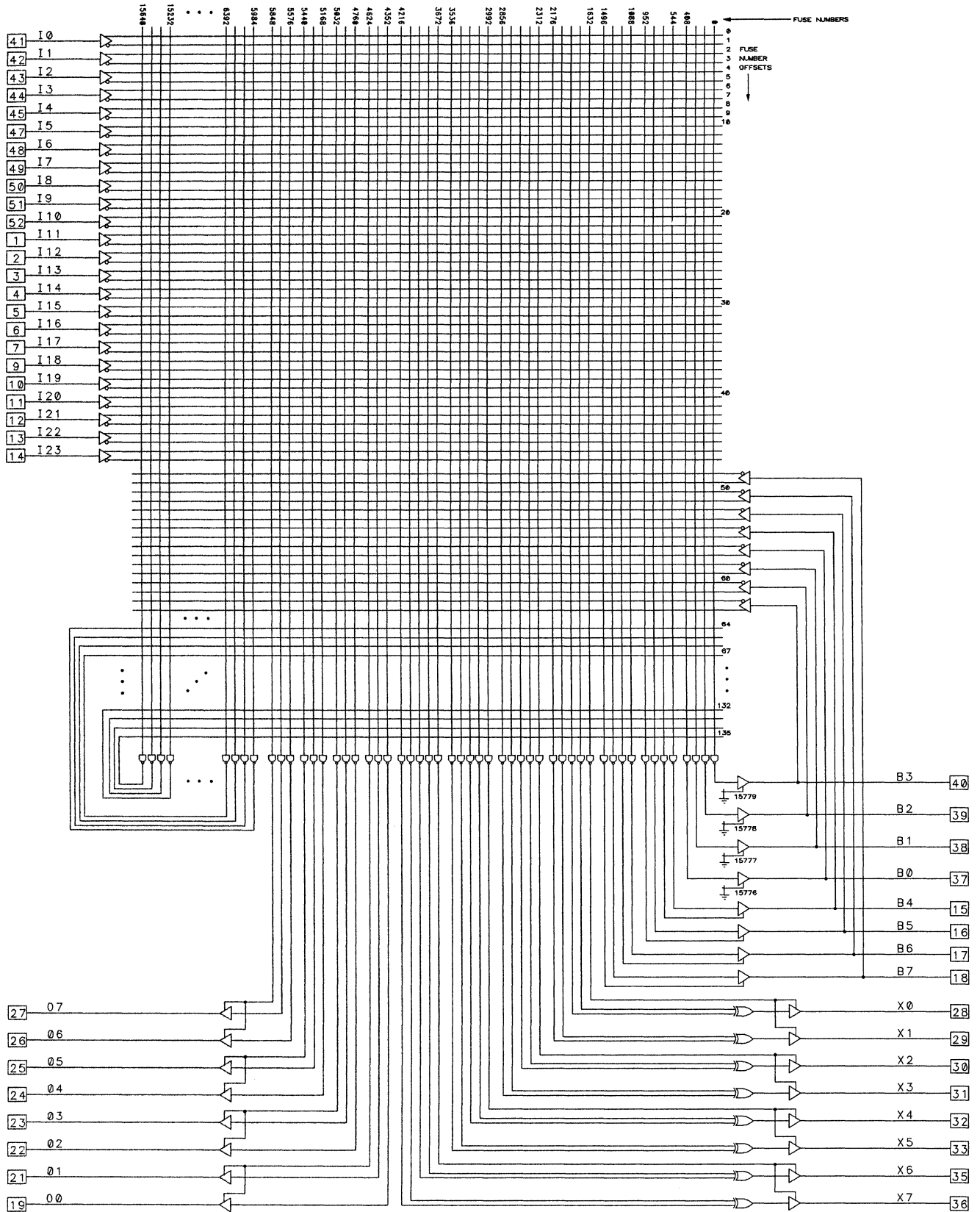
Logic Diagram Package

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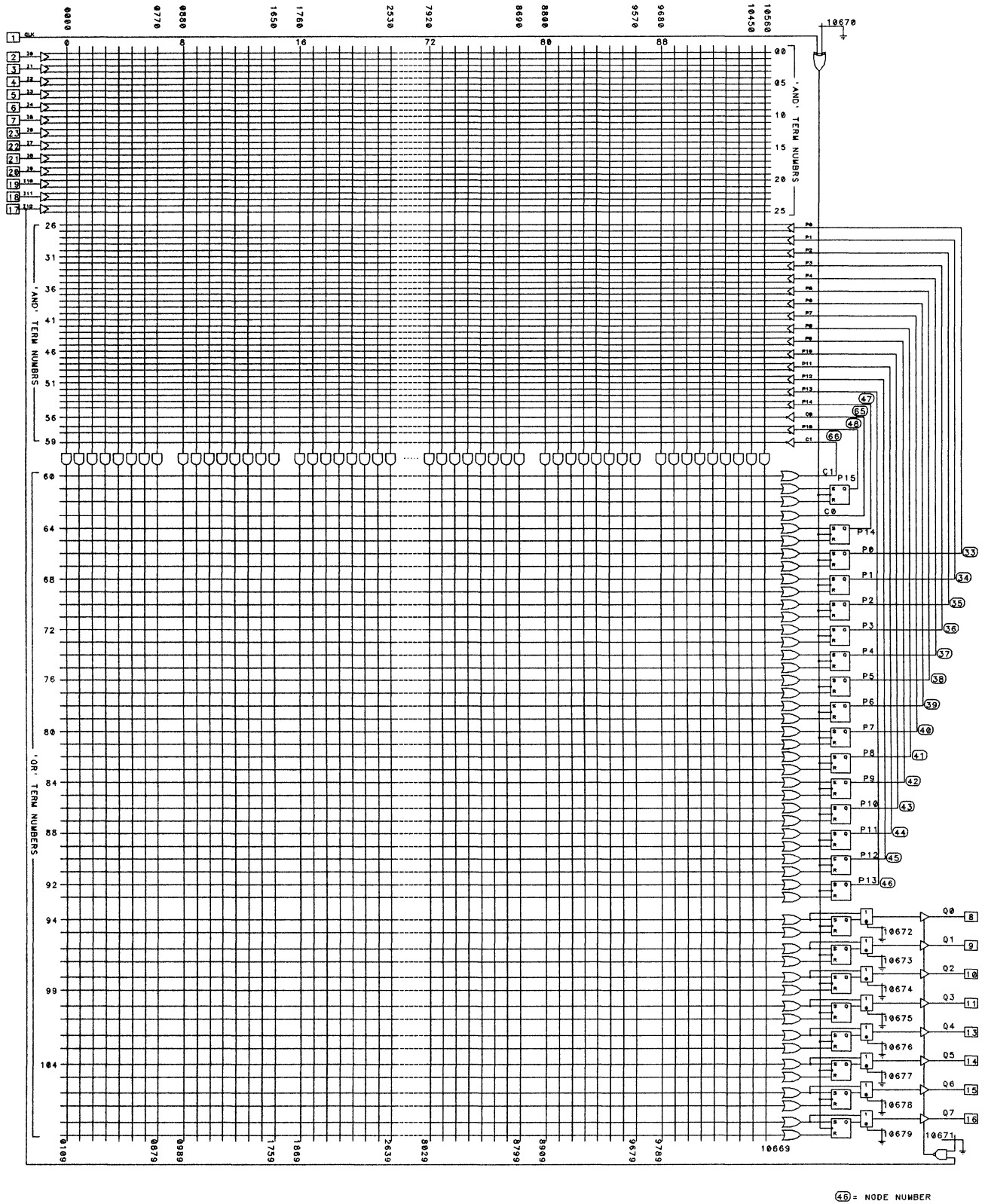
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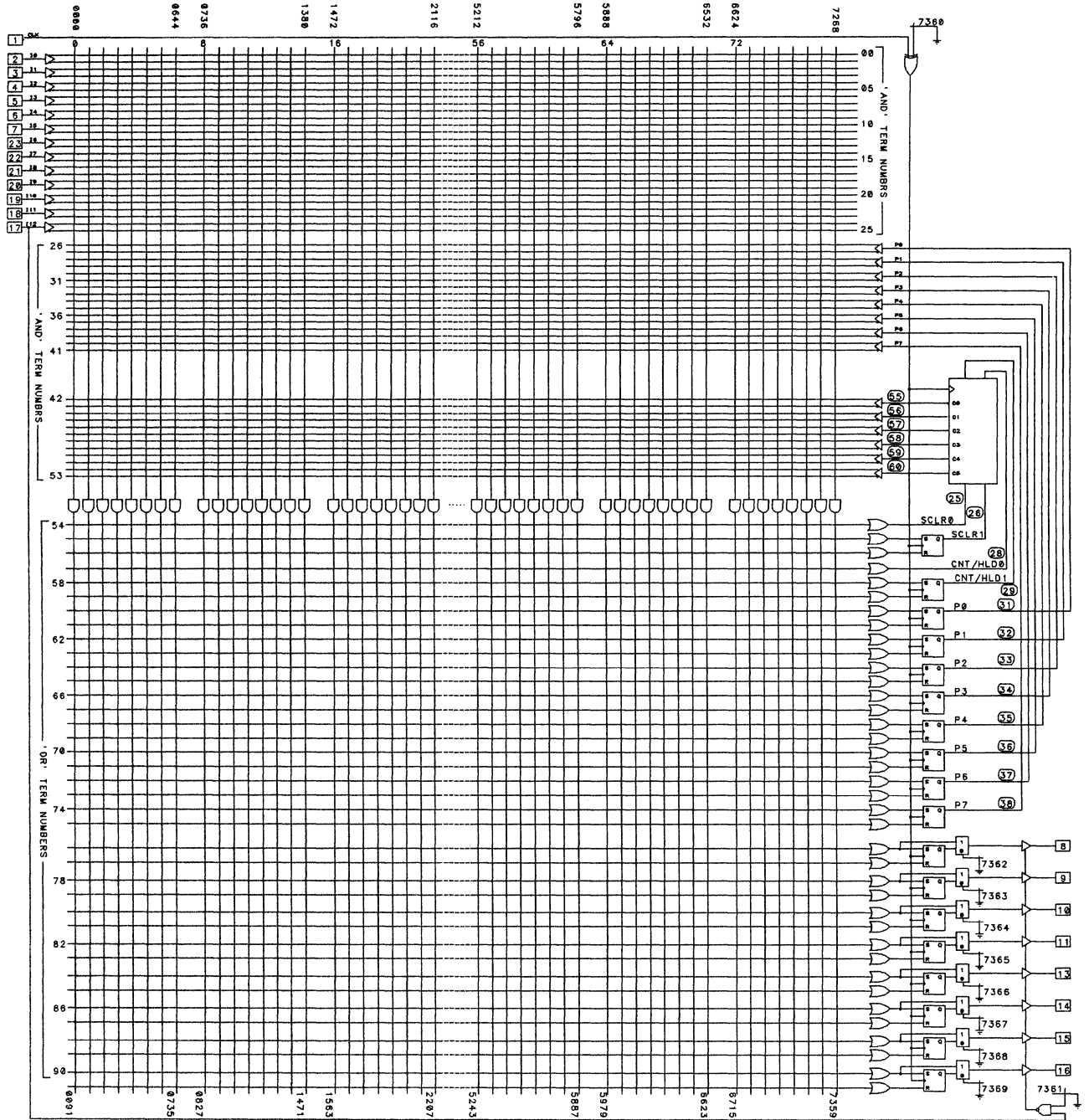


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

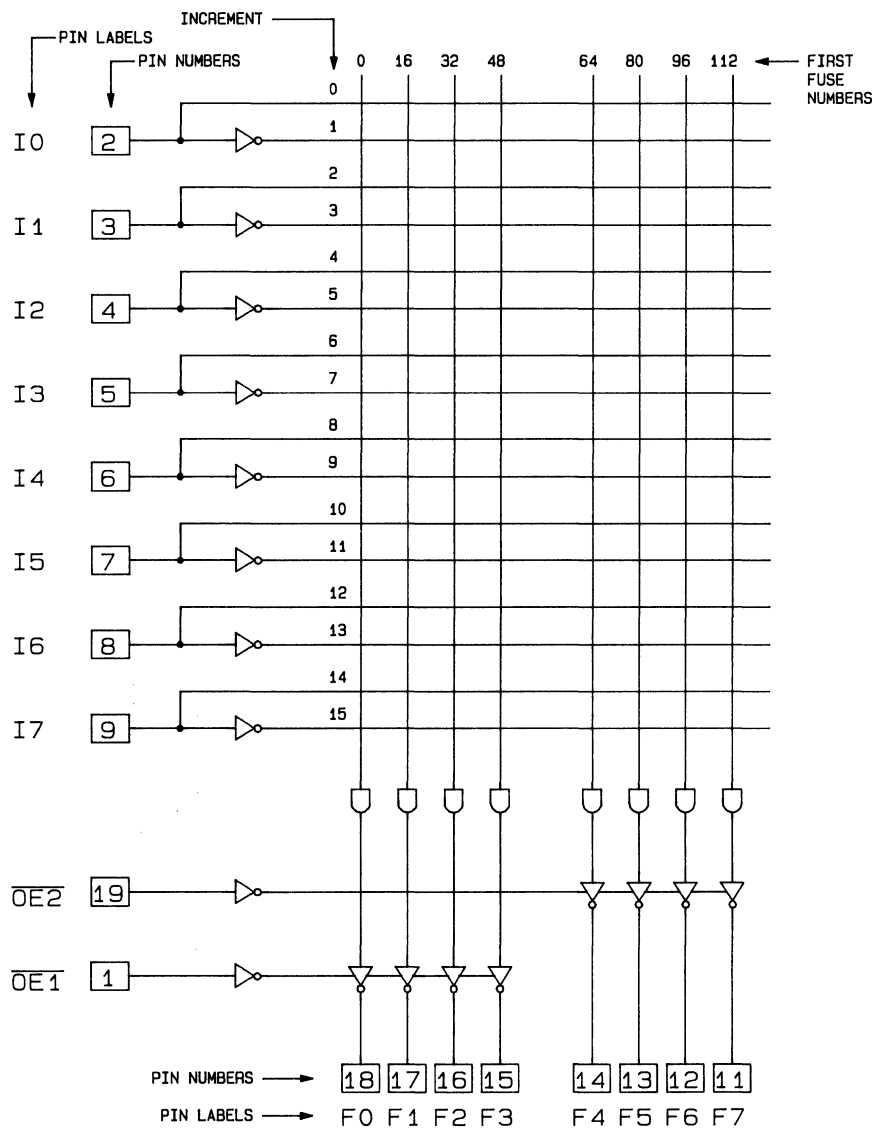


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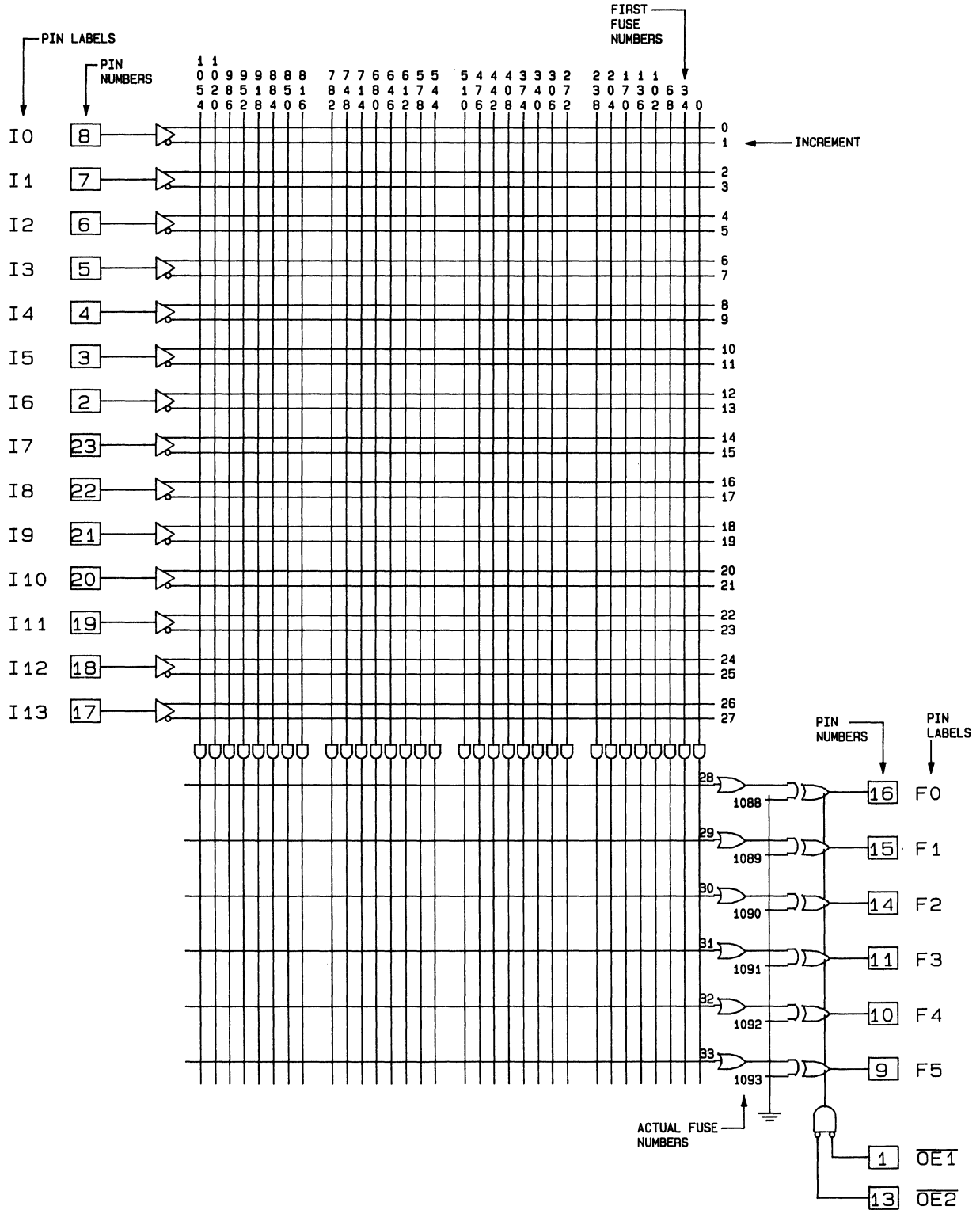




Ⓢ - NODE NUMBER



NOTE: FUSE NUMBER = FIRST FUSE NUMBER = INCREMENT

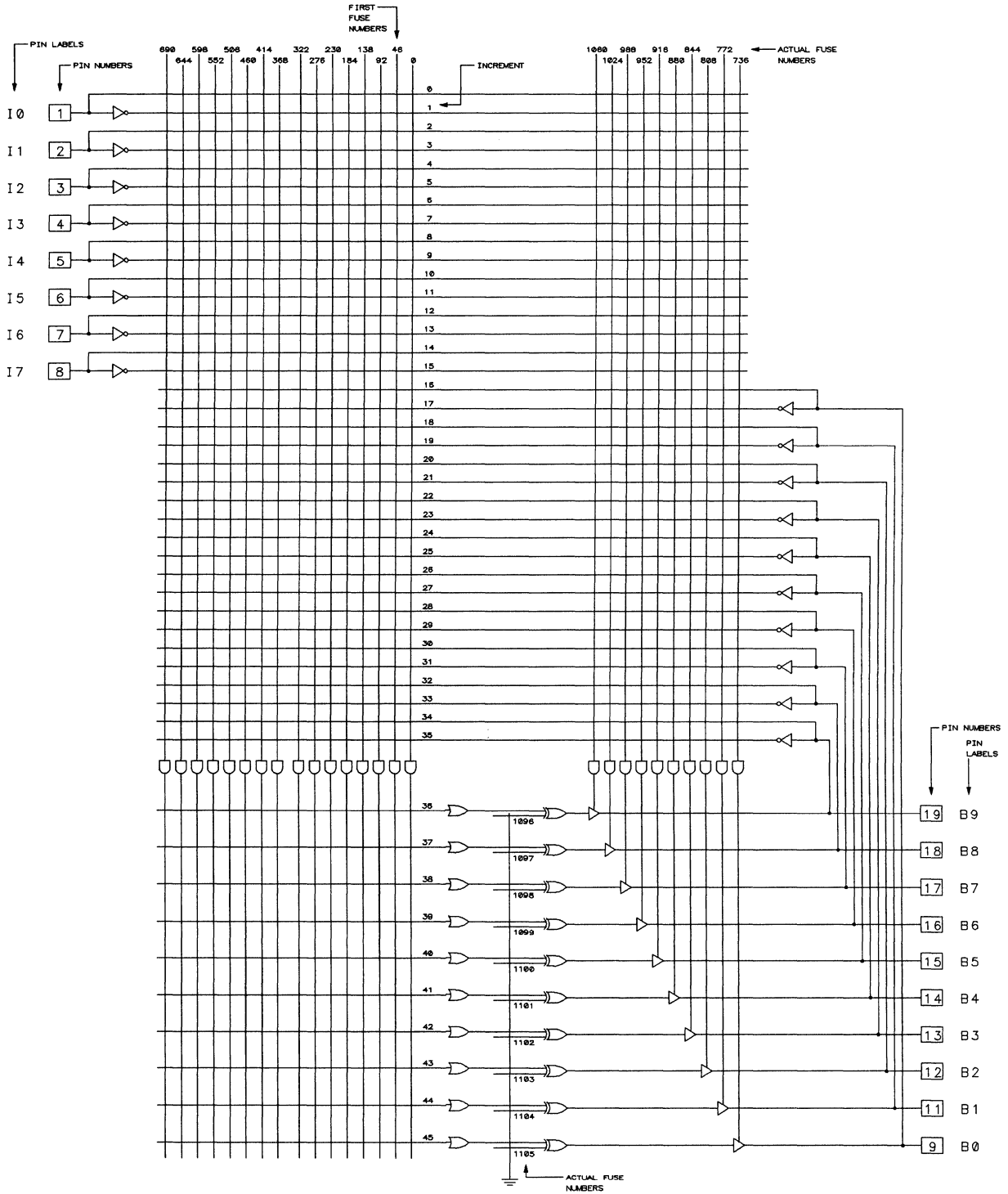


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

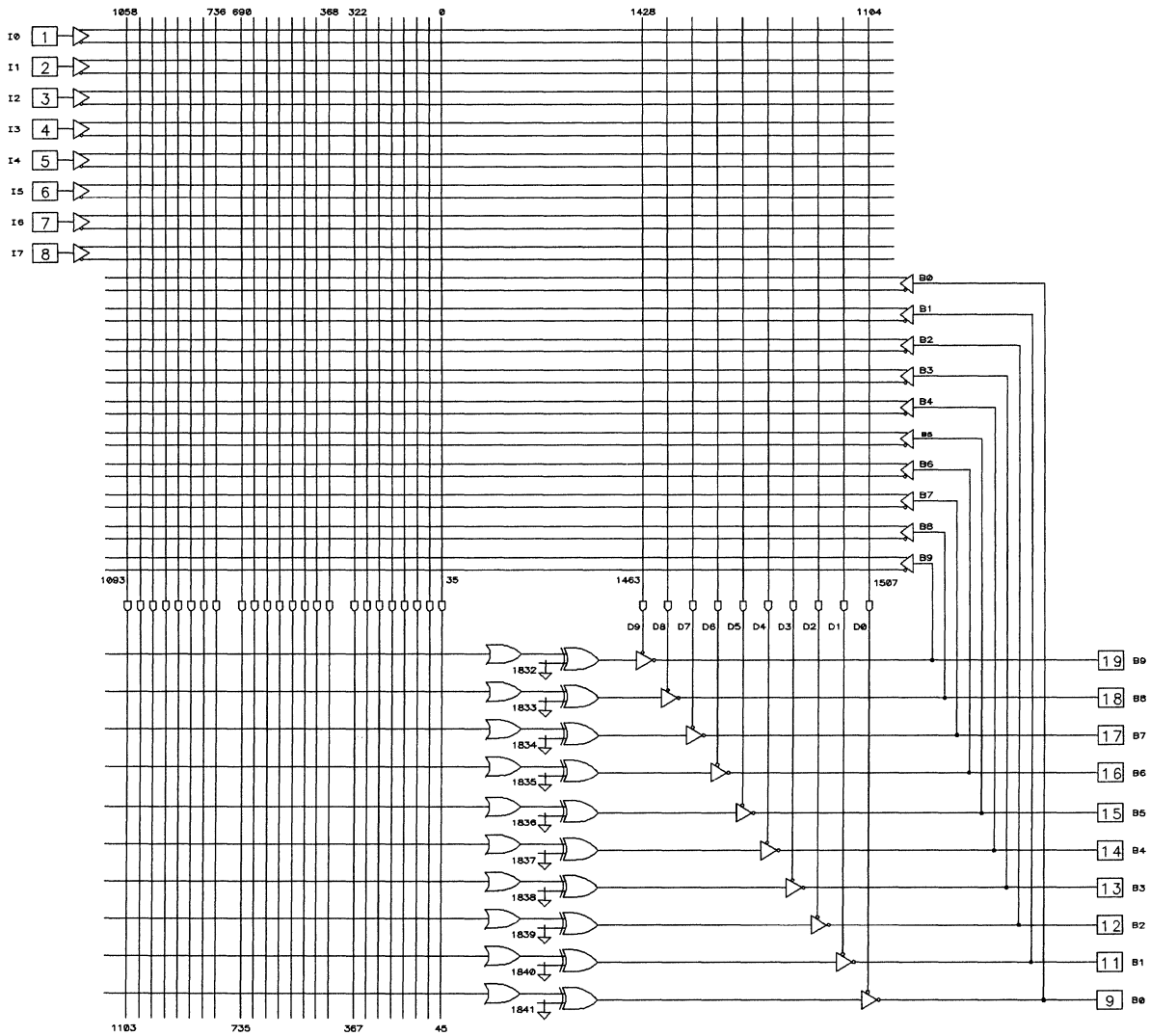
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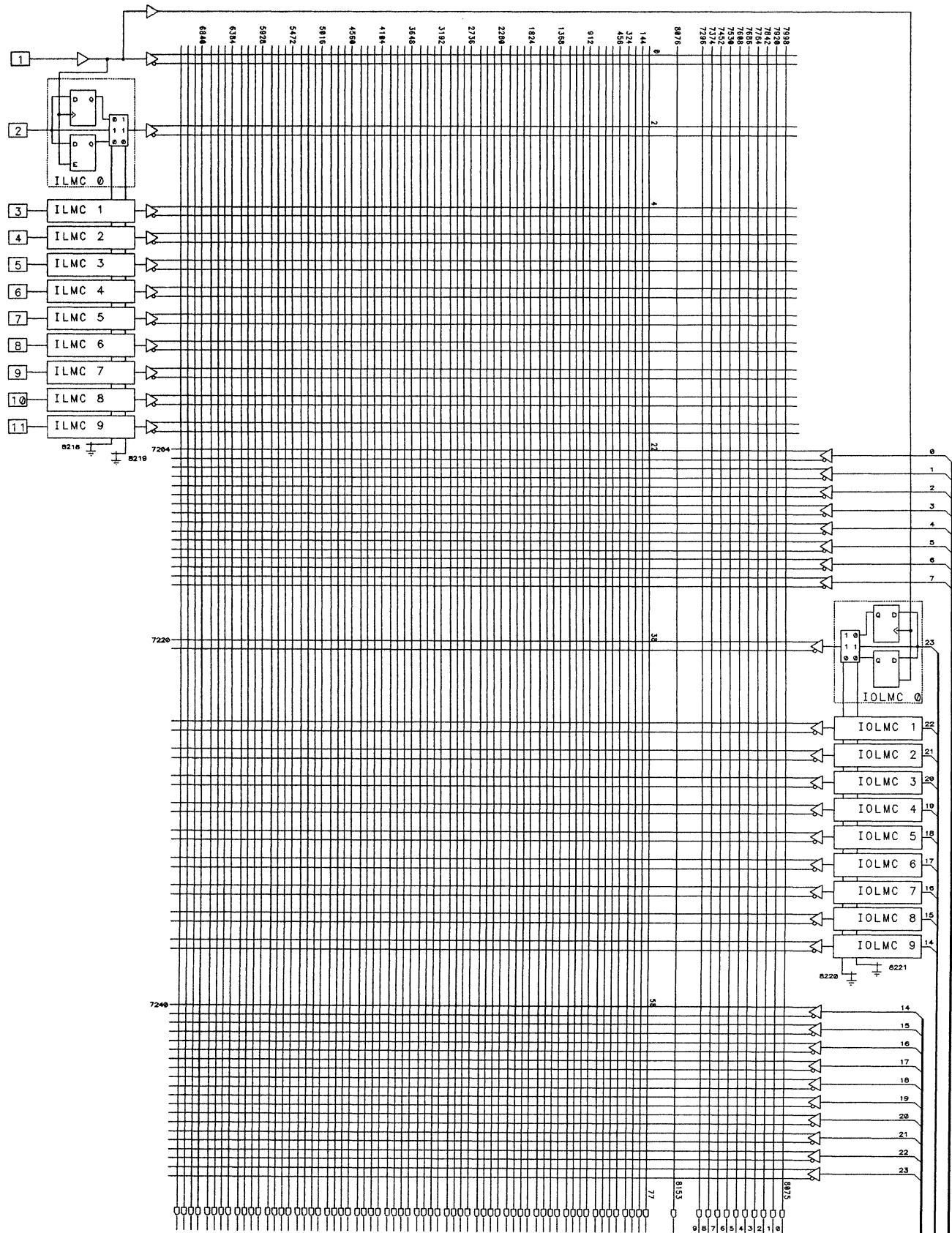


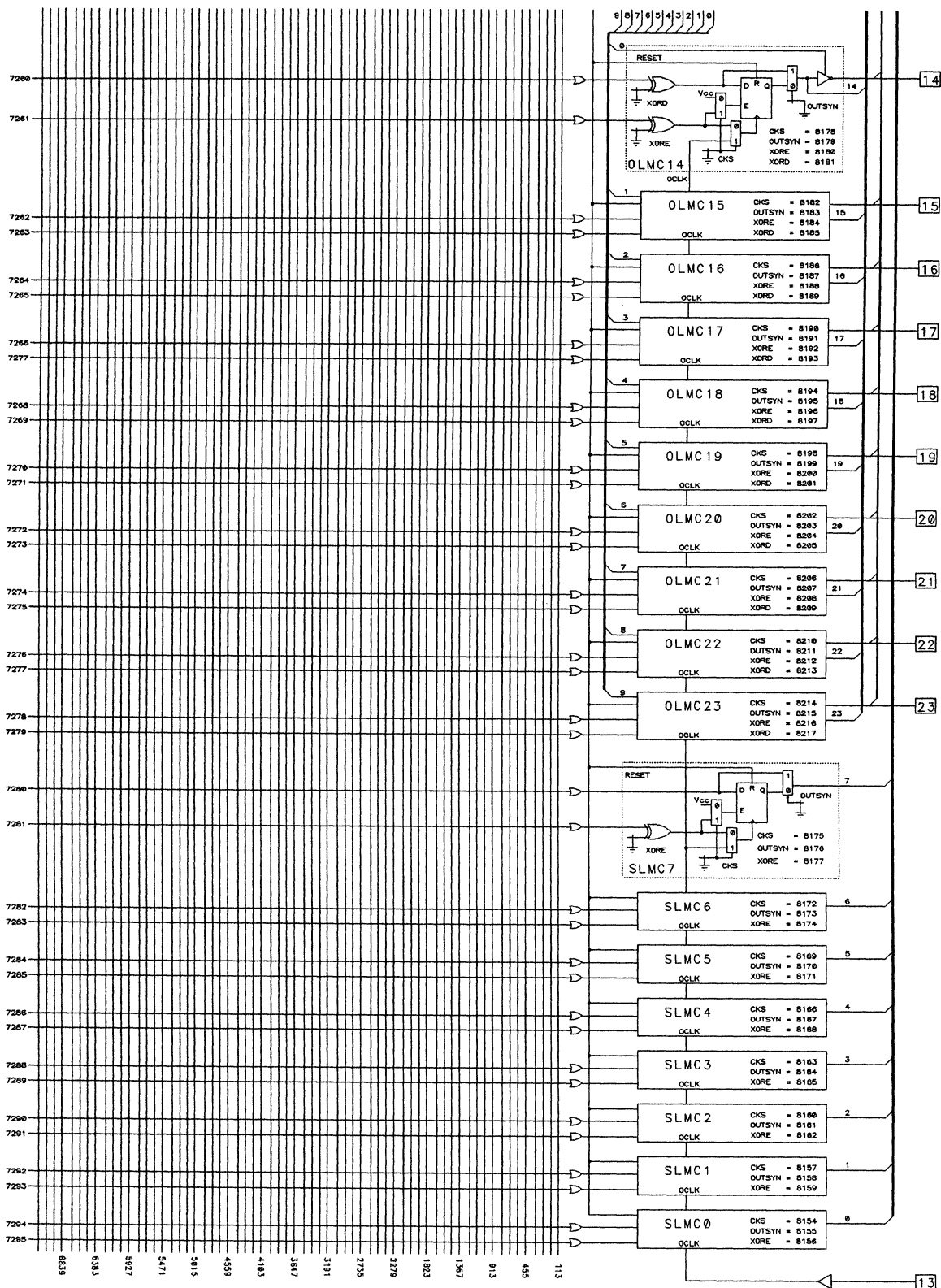
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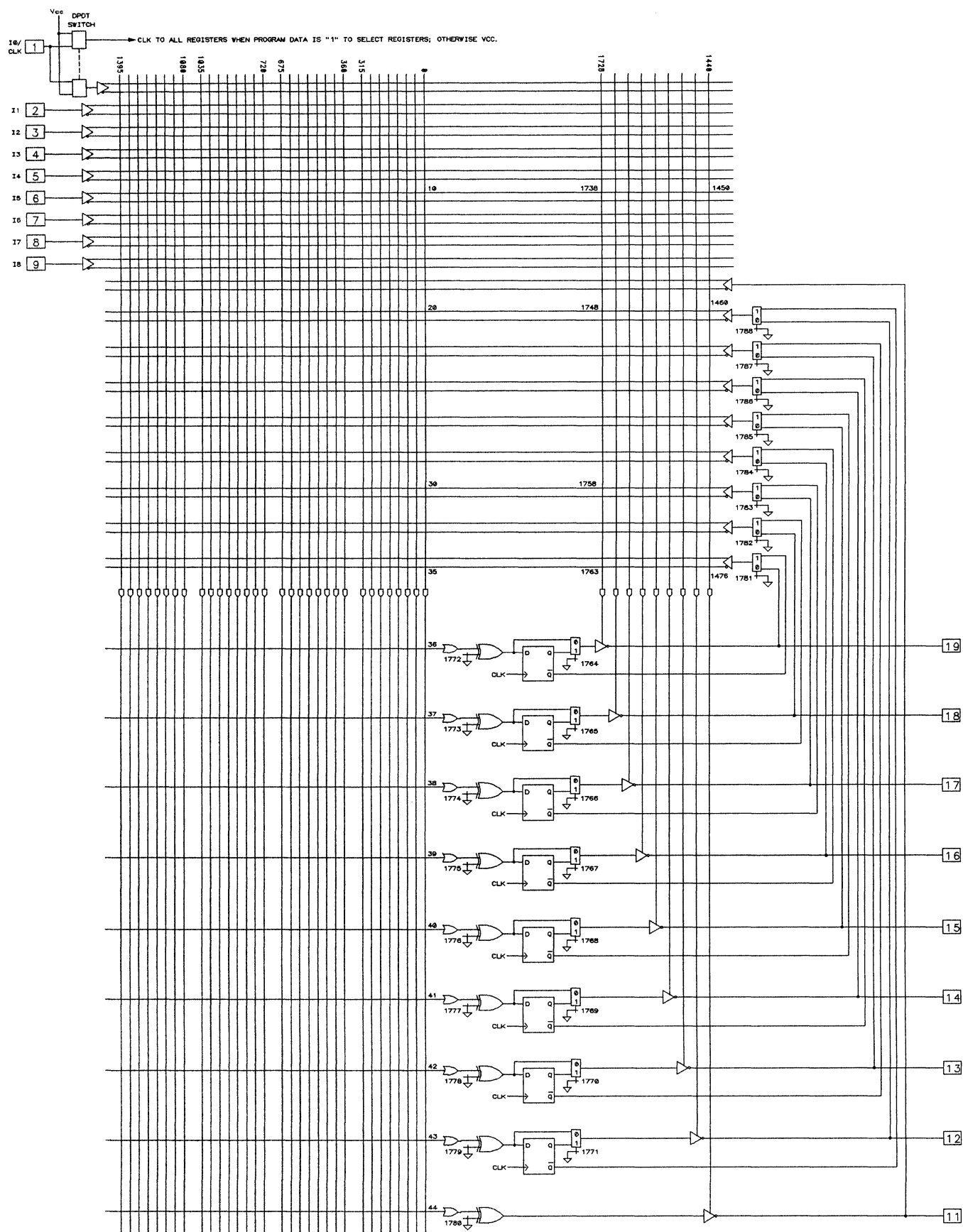
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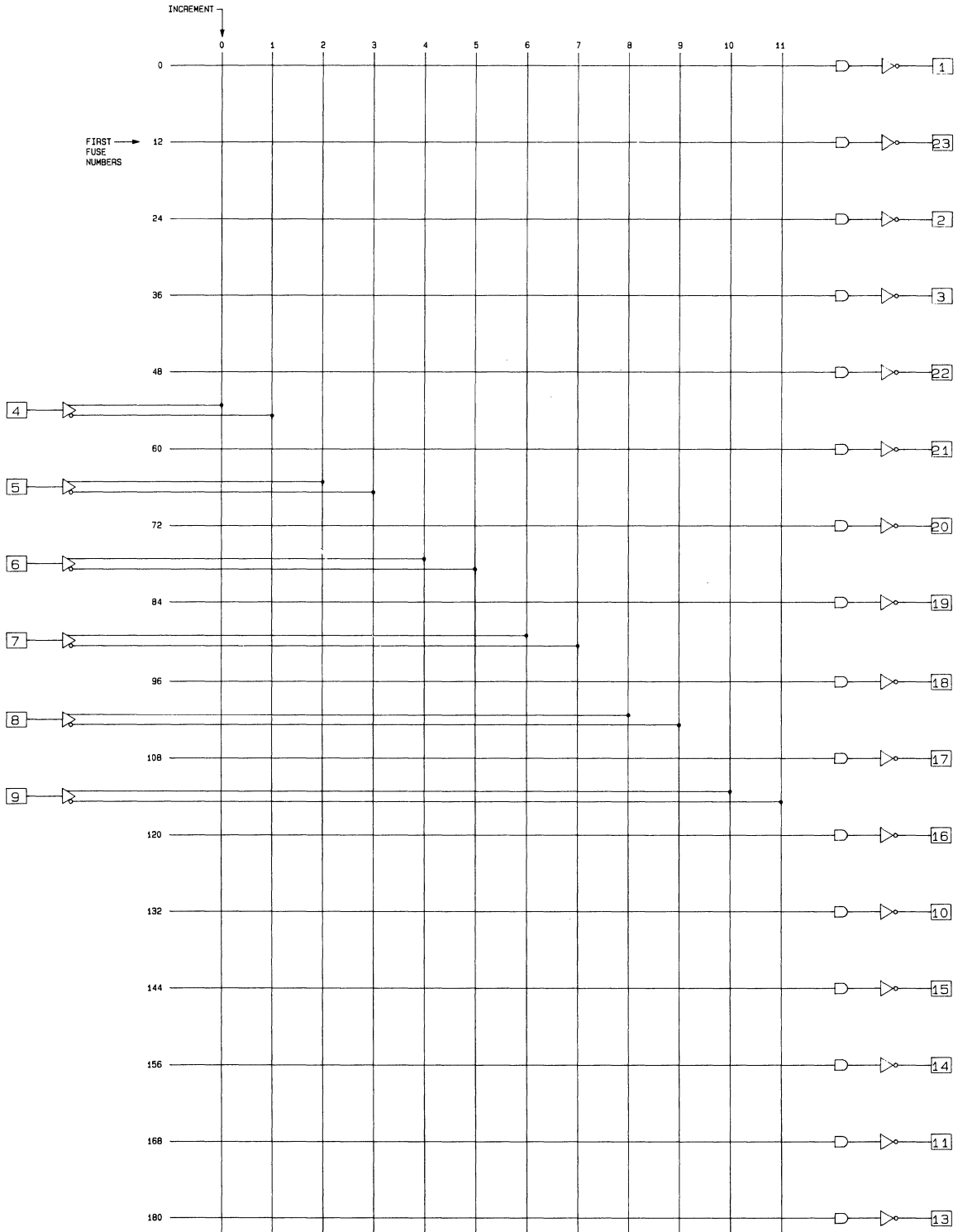




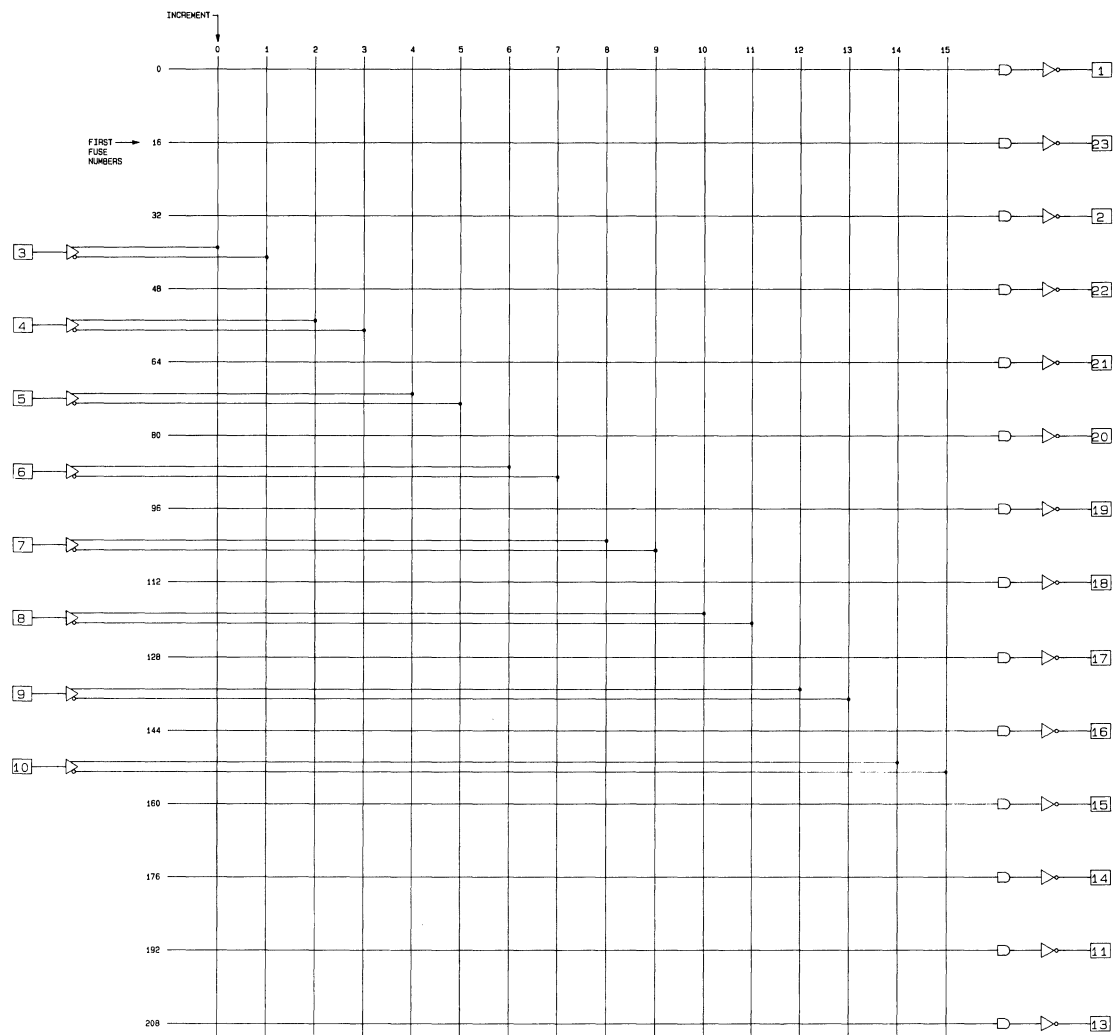
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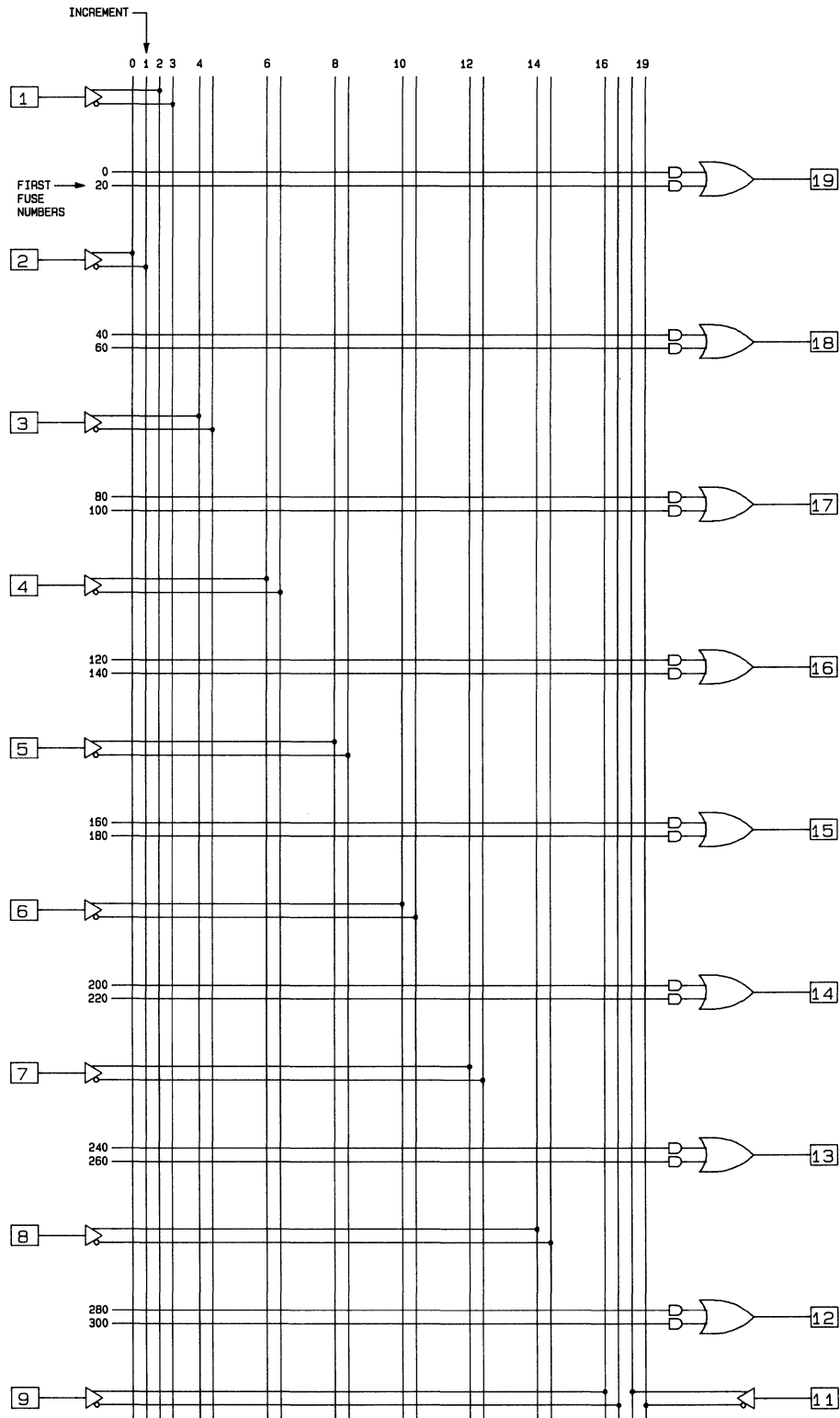




NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT



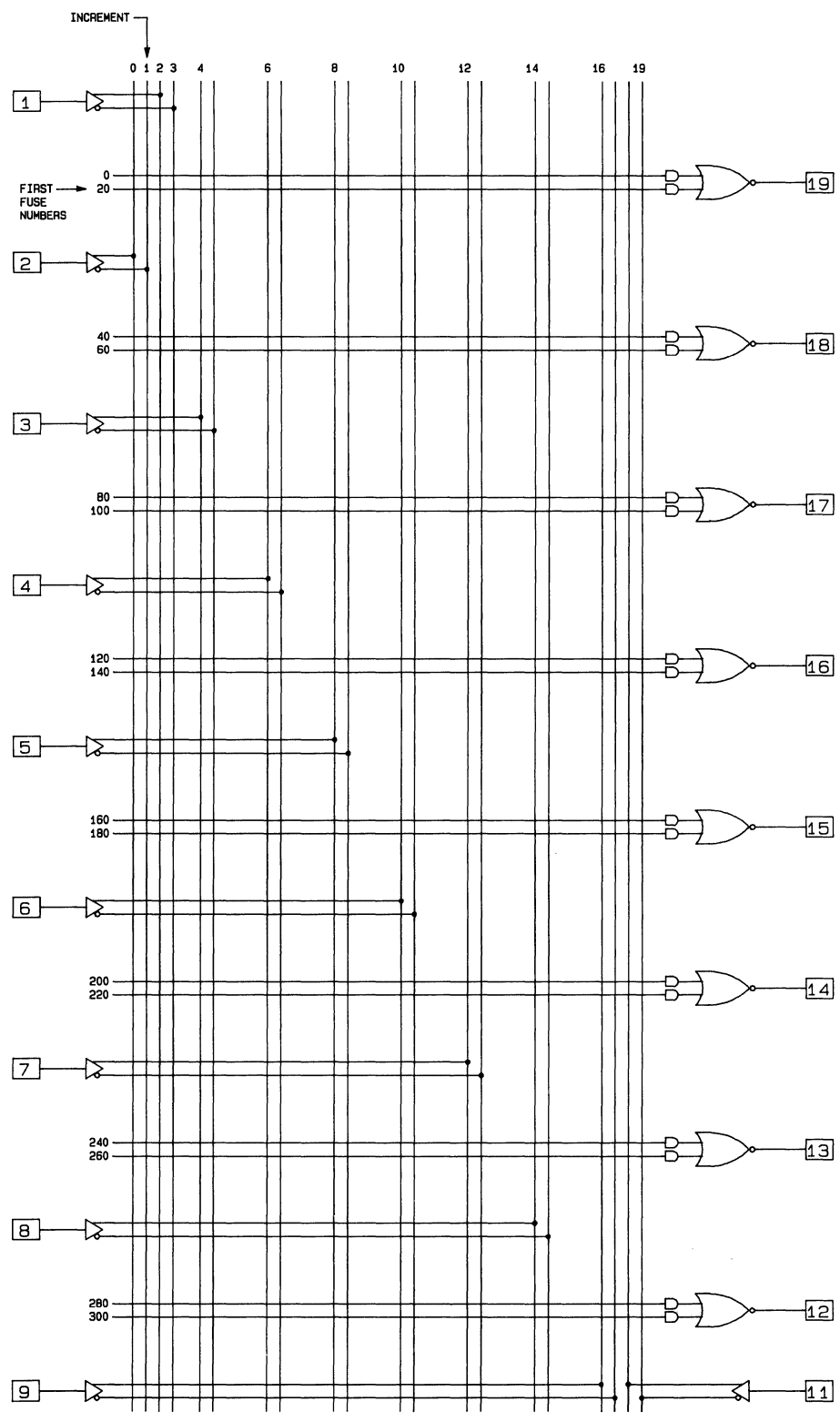
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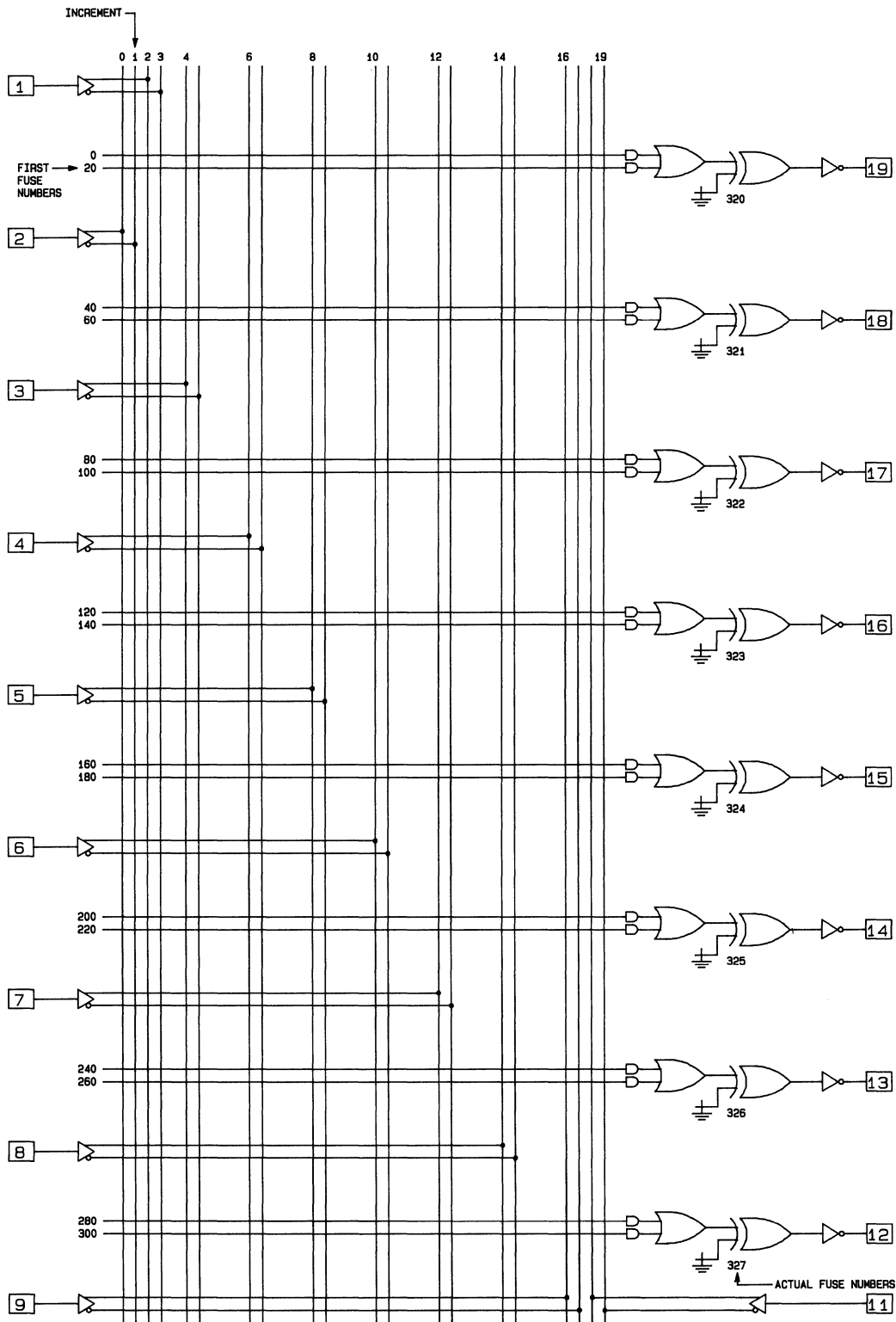
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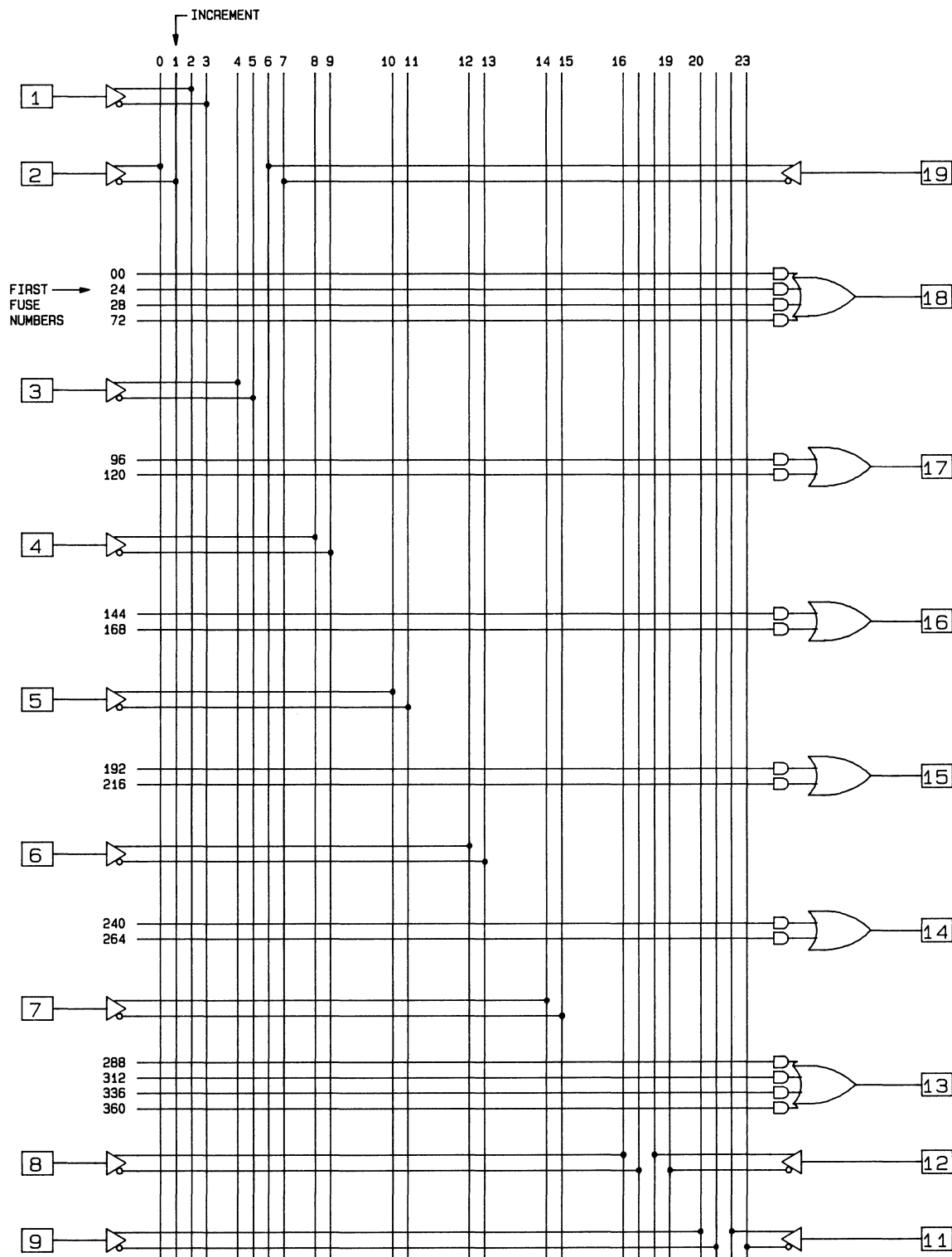


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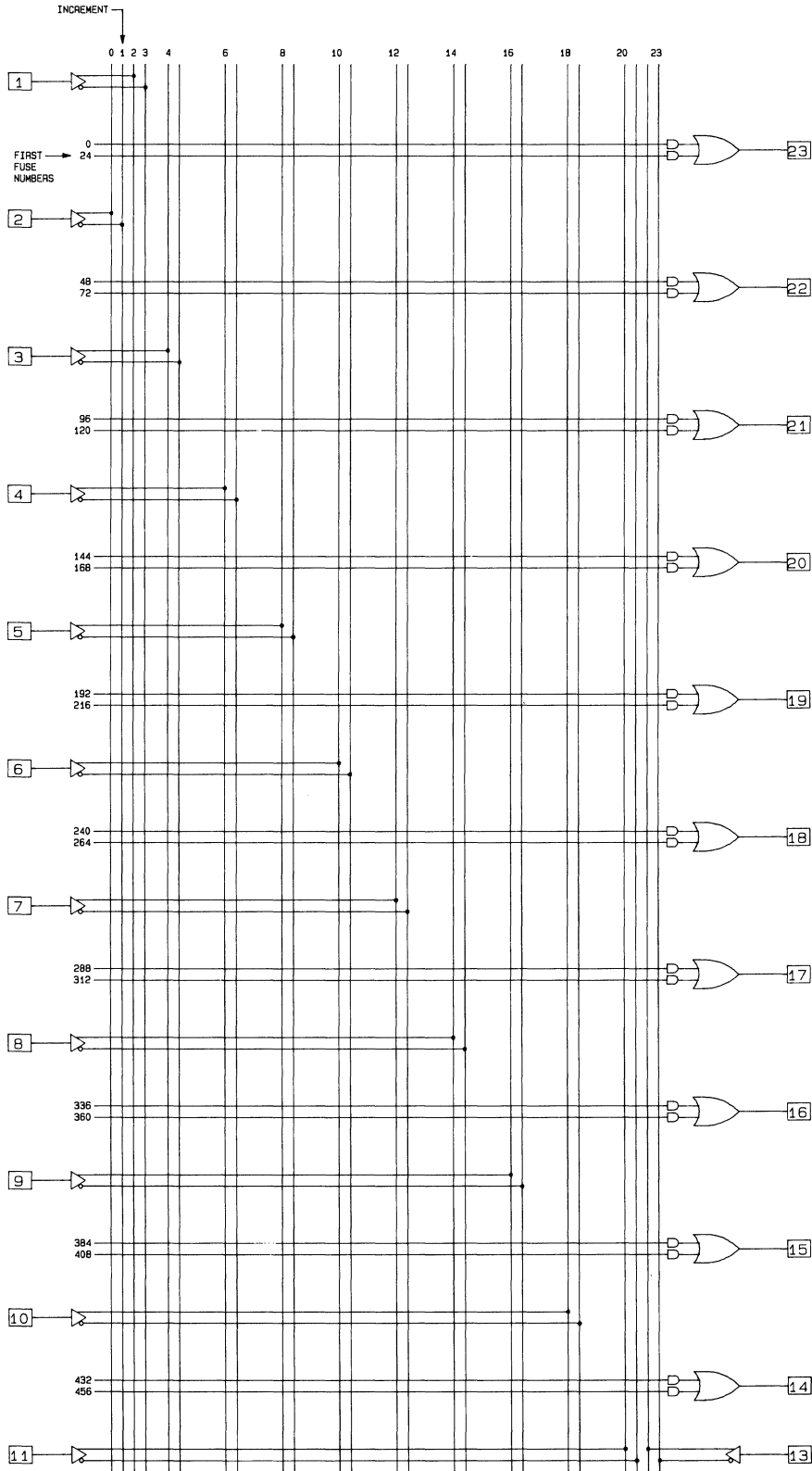


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

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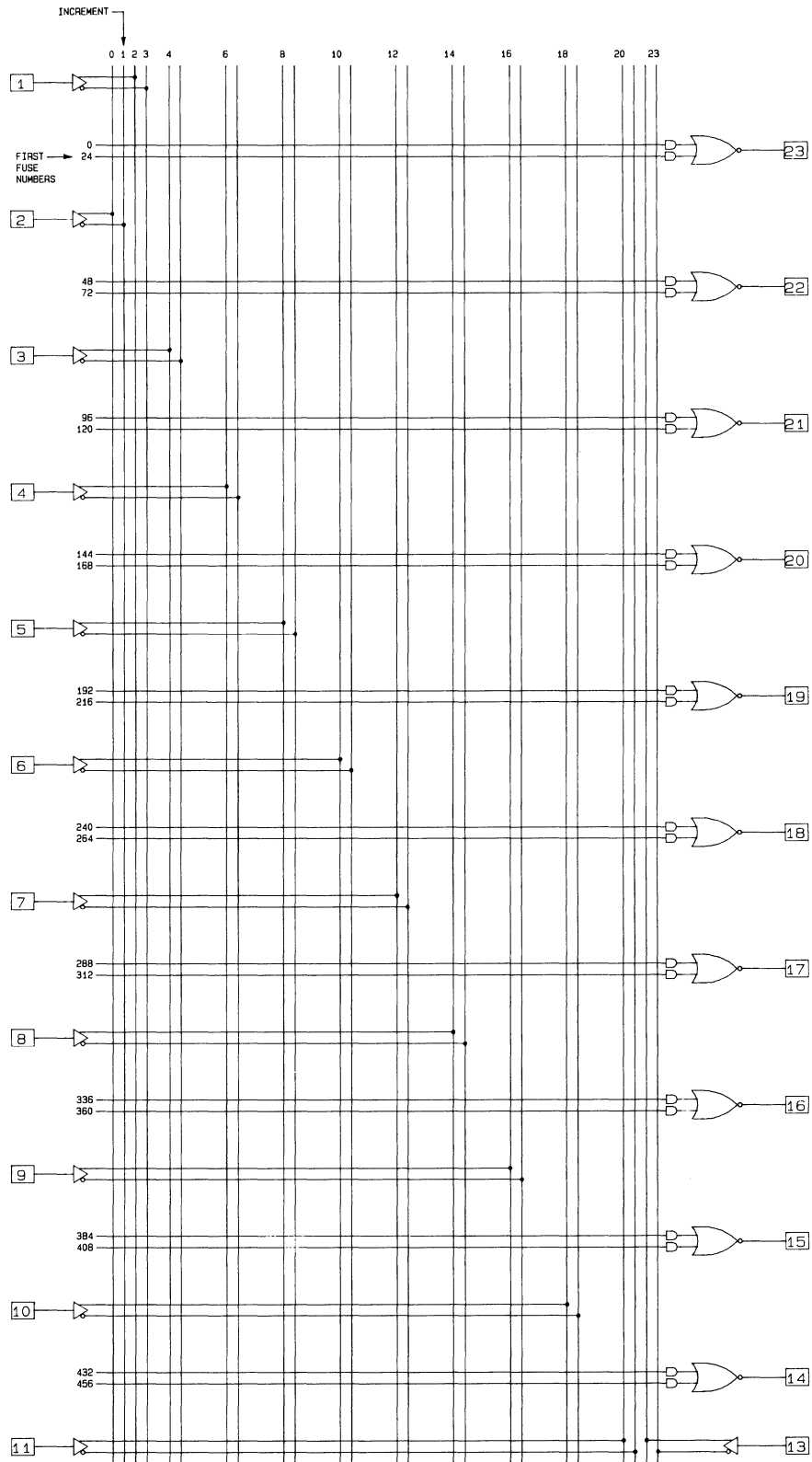


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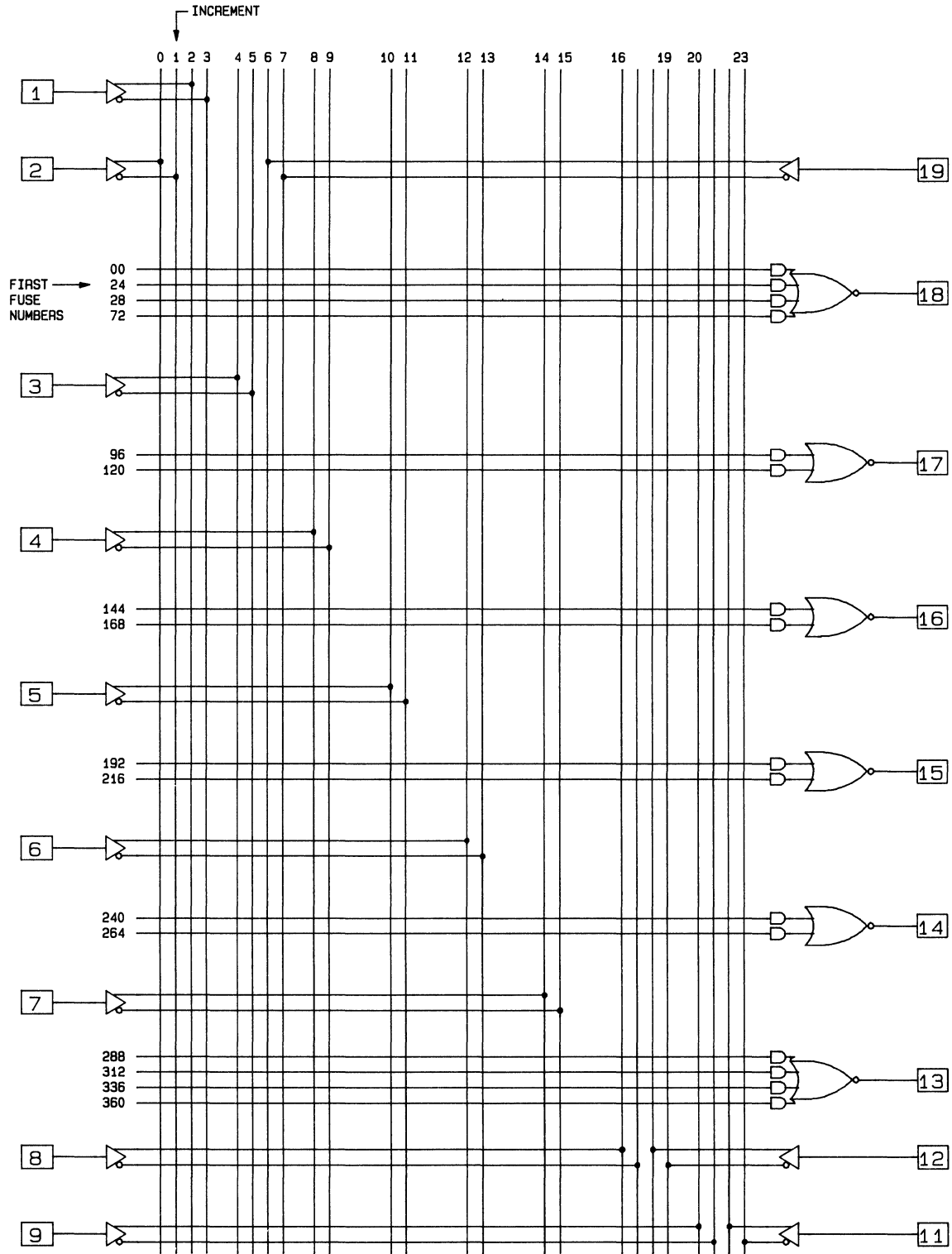


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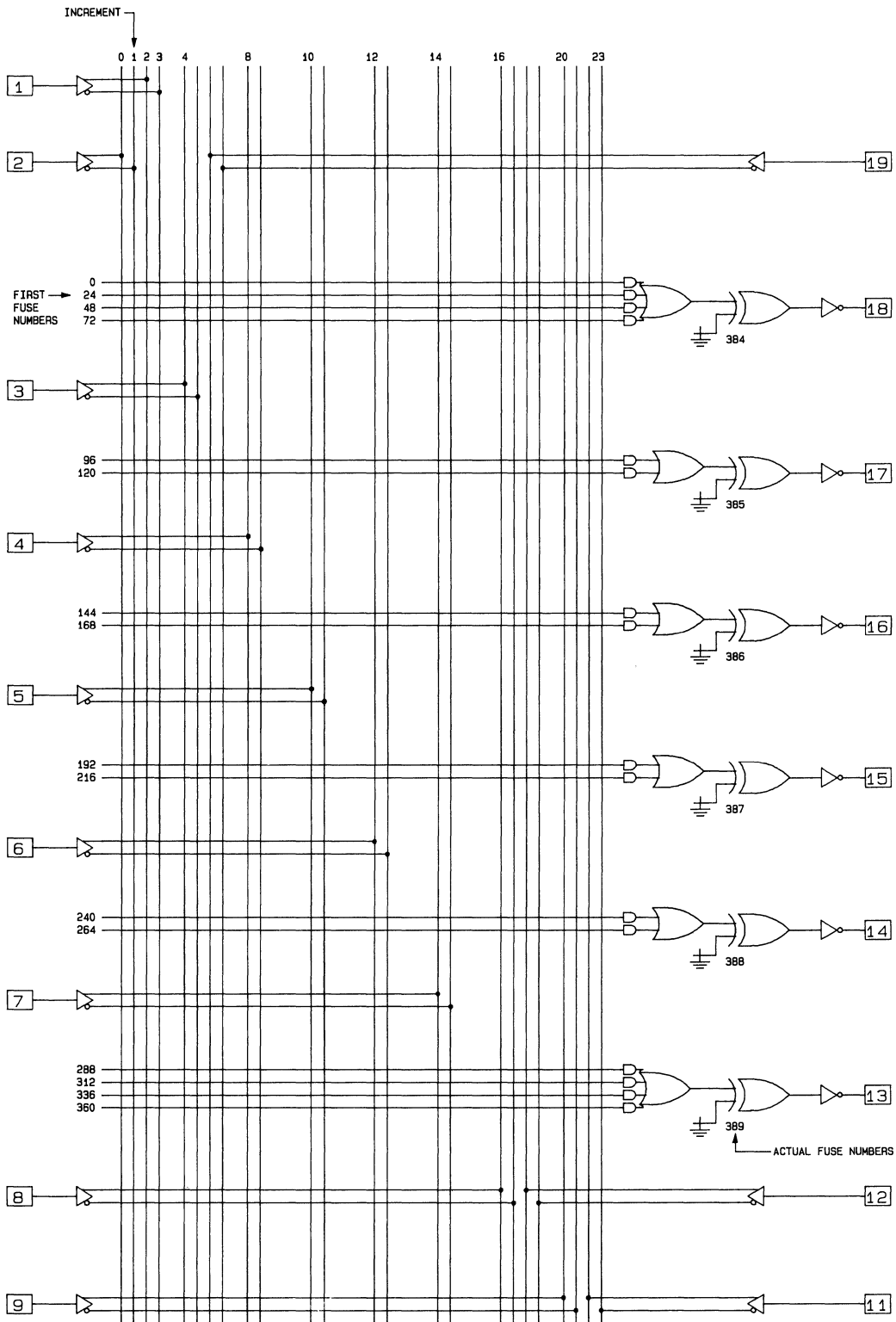


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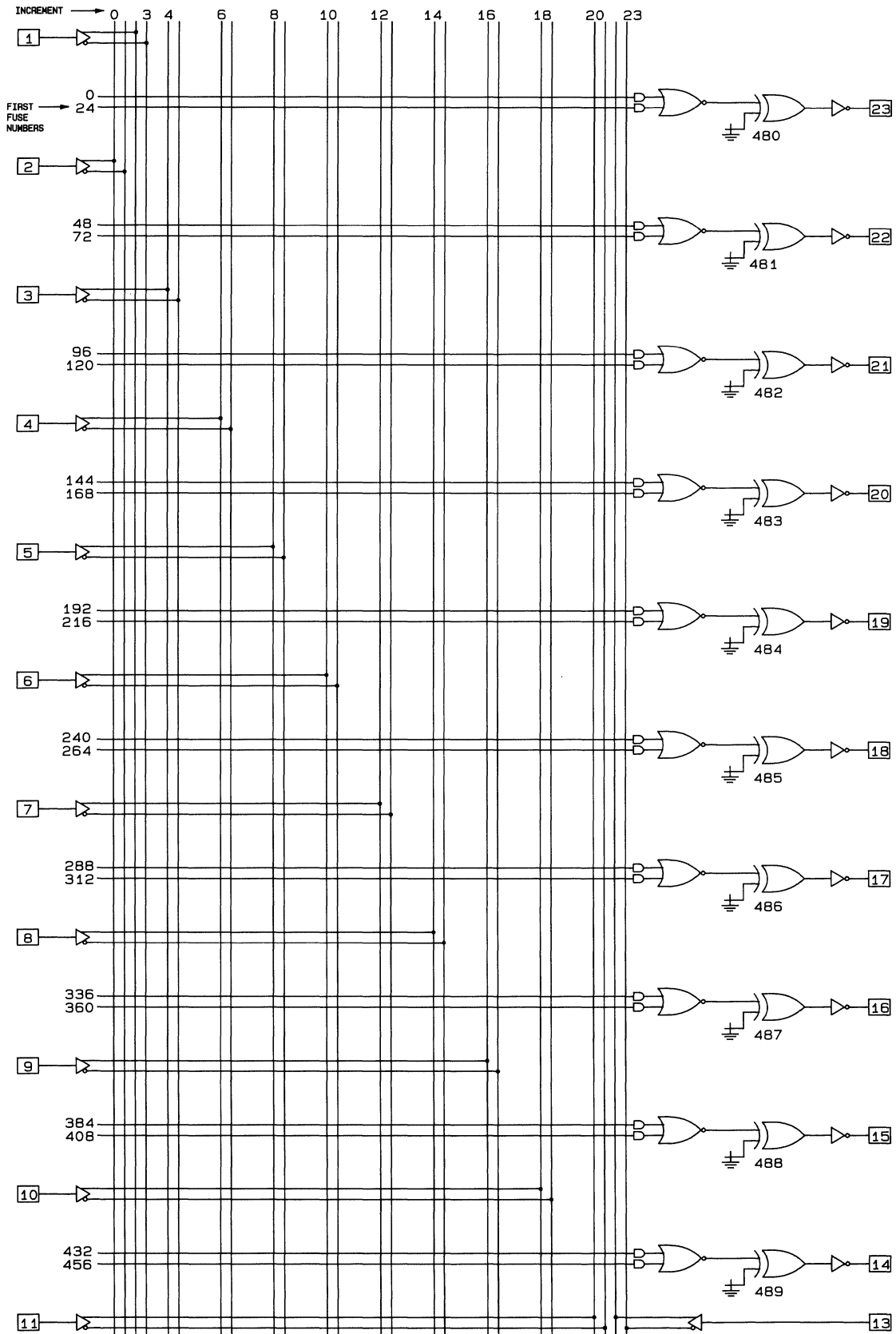


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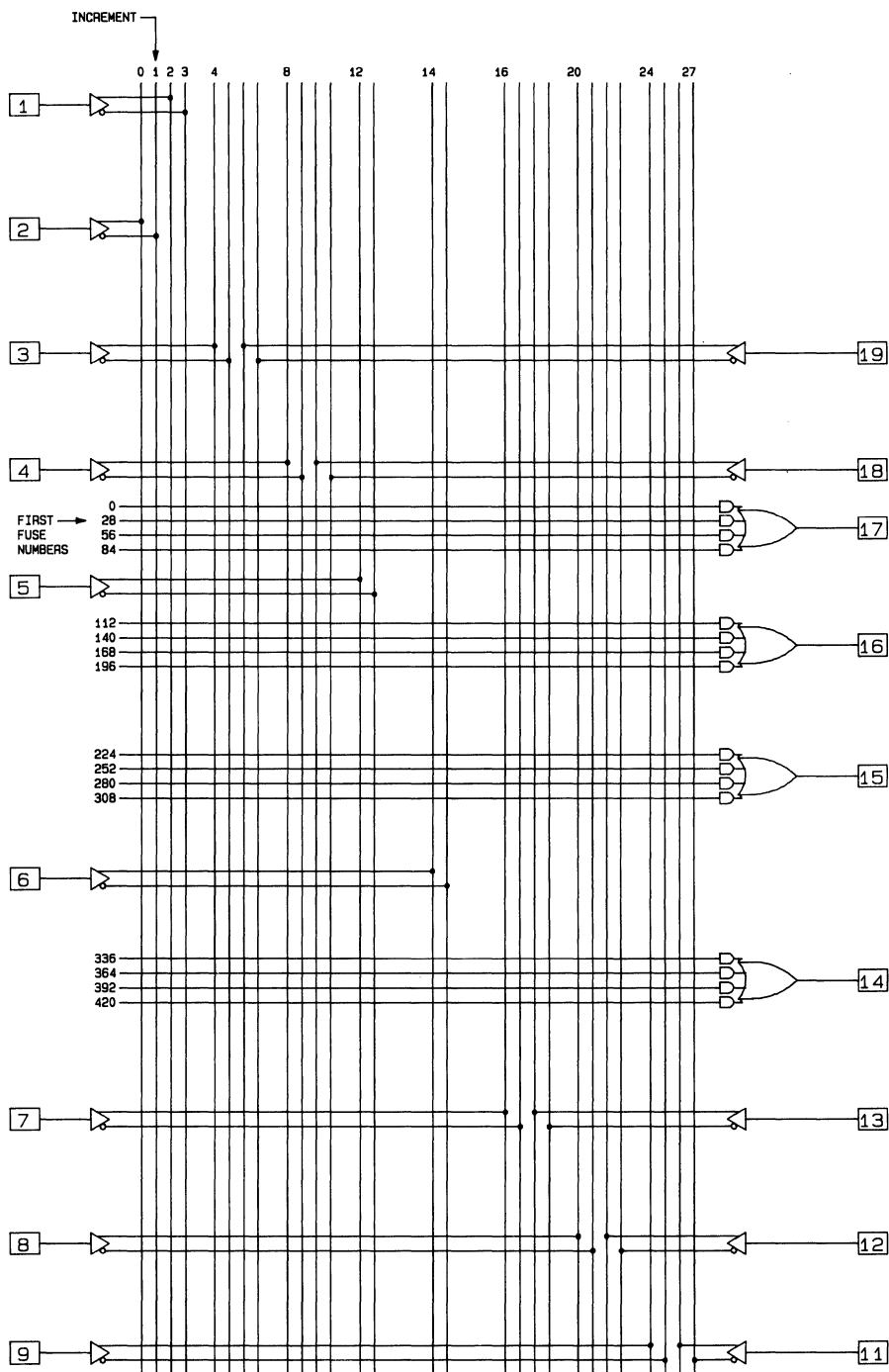
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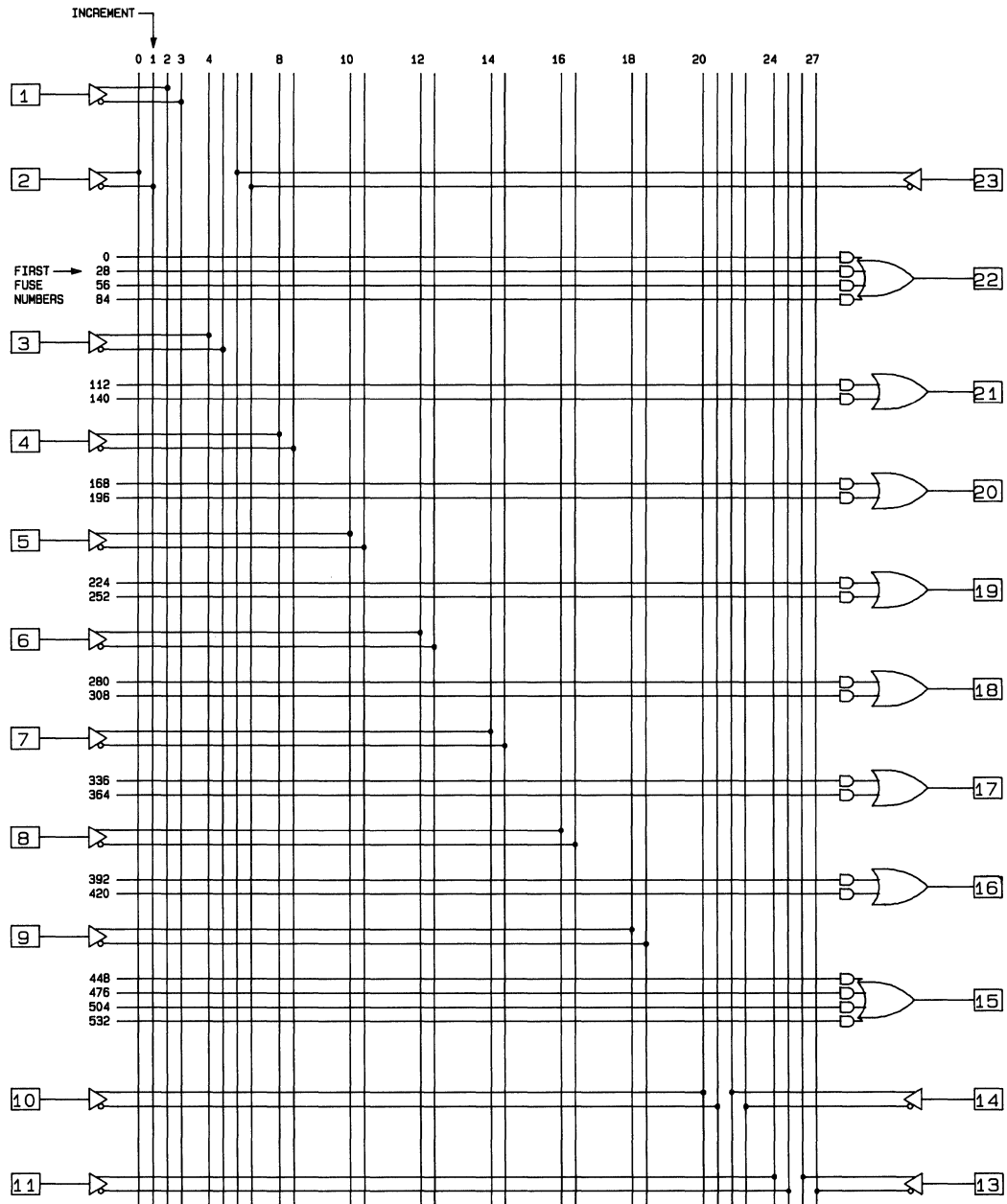
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Data I/O Corporation

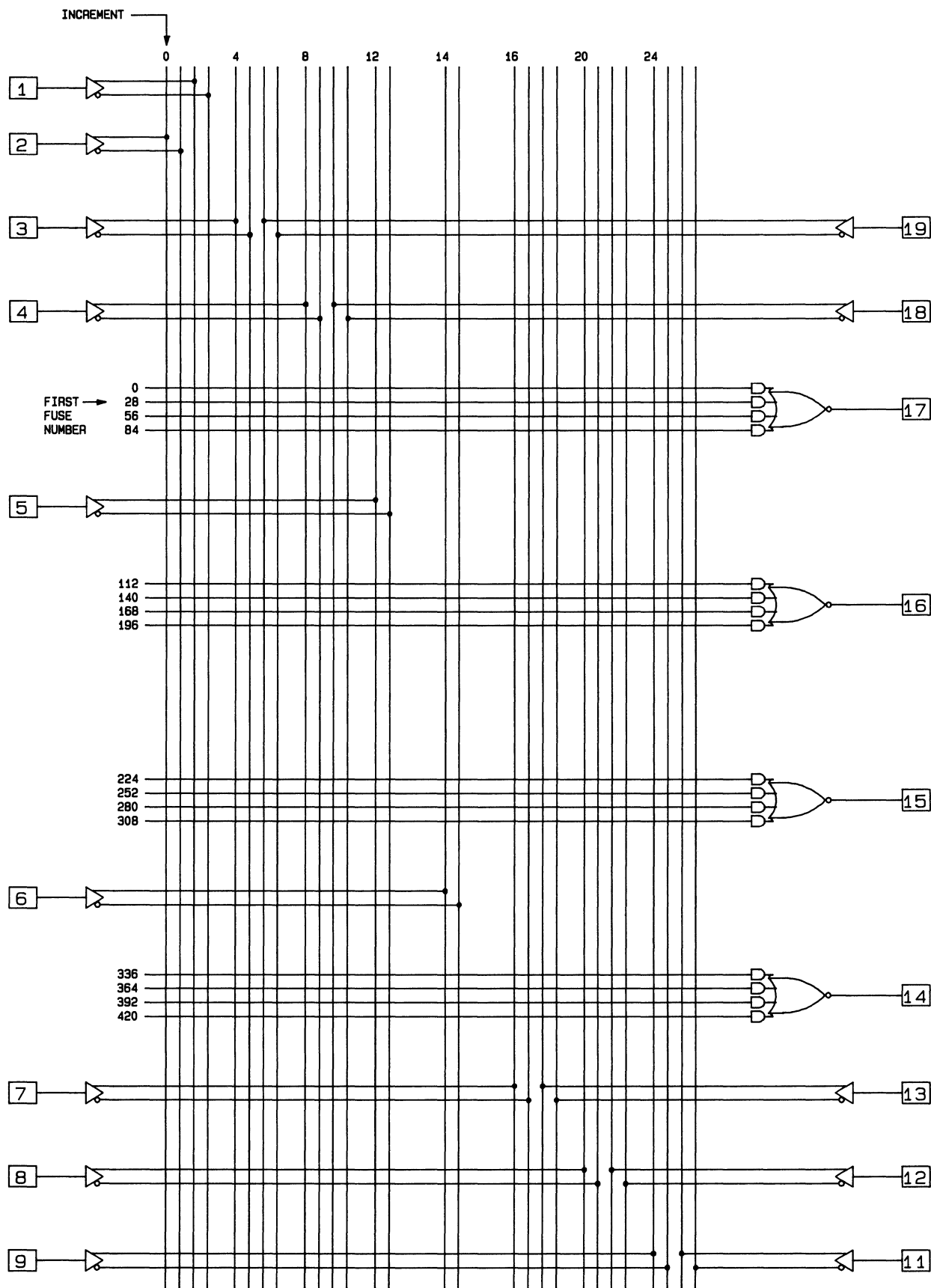


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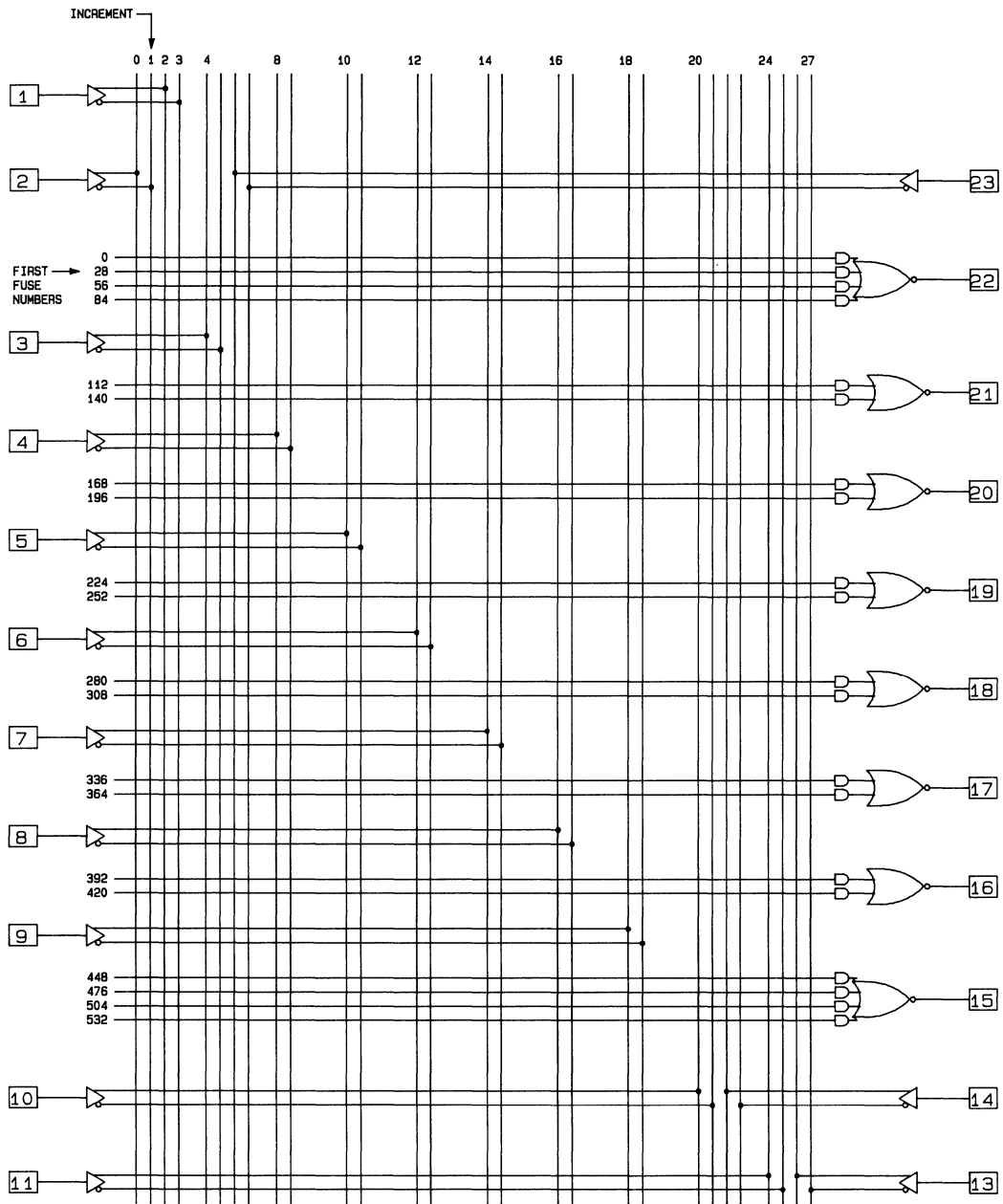


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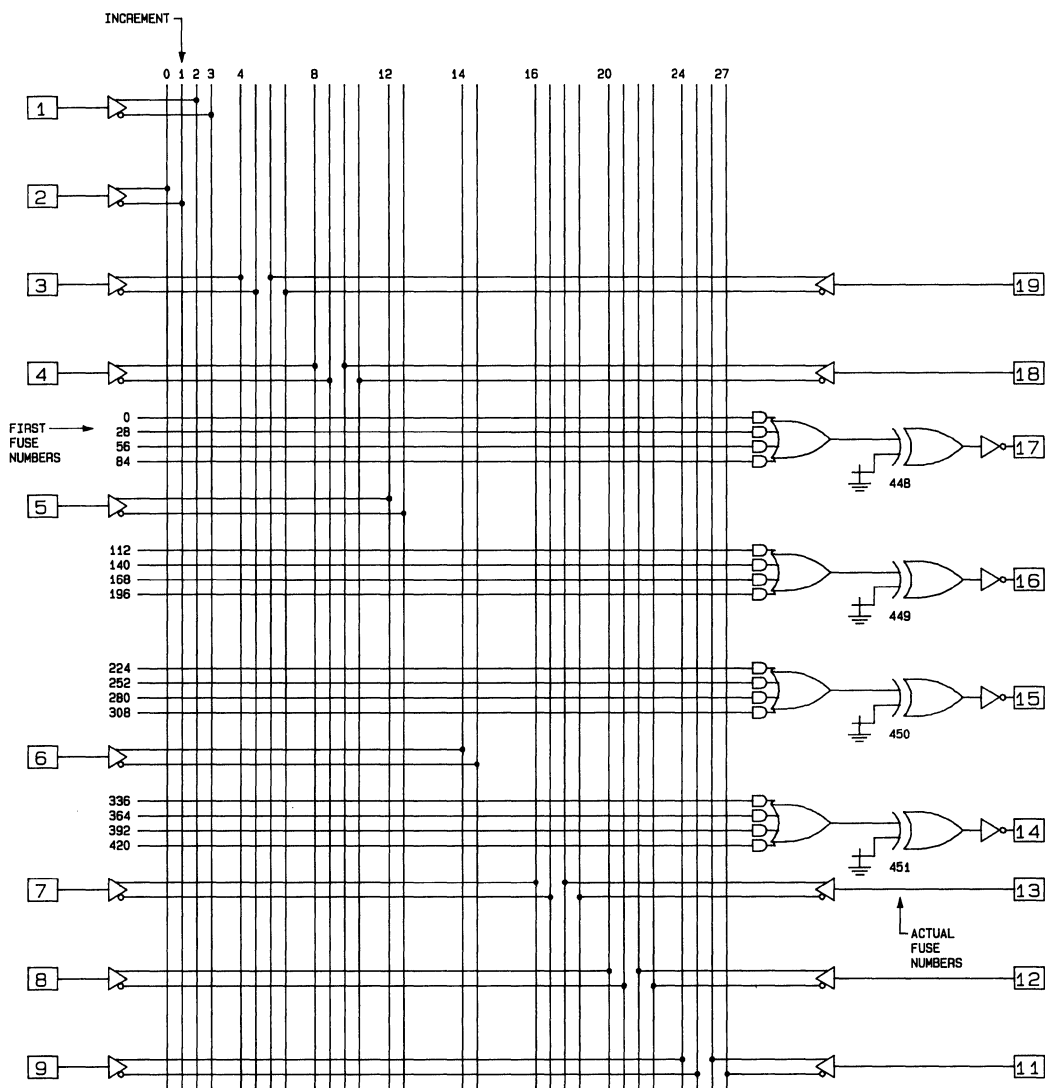
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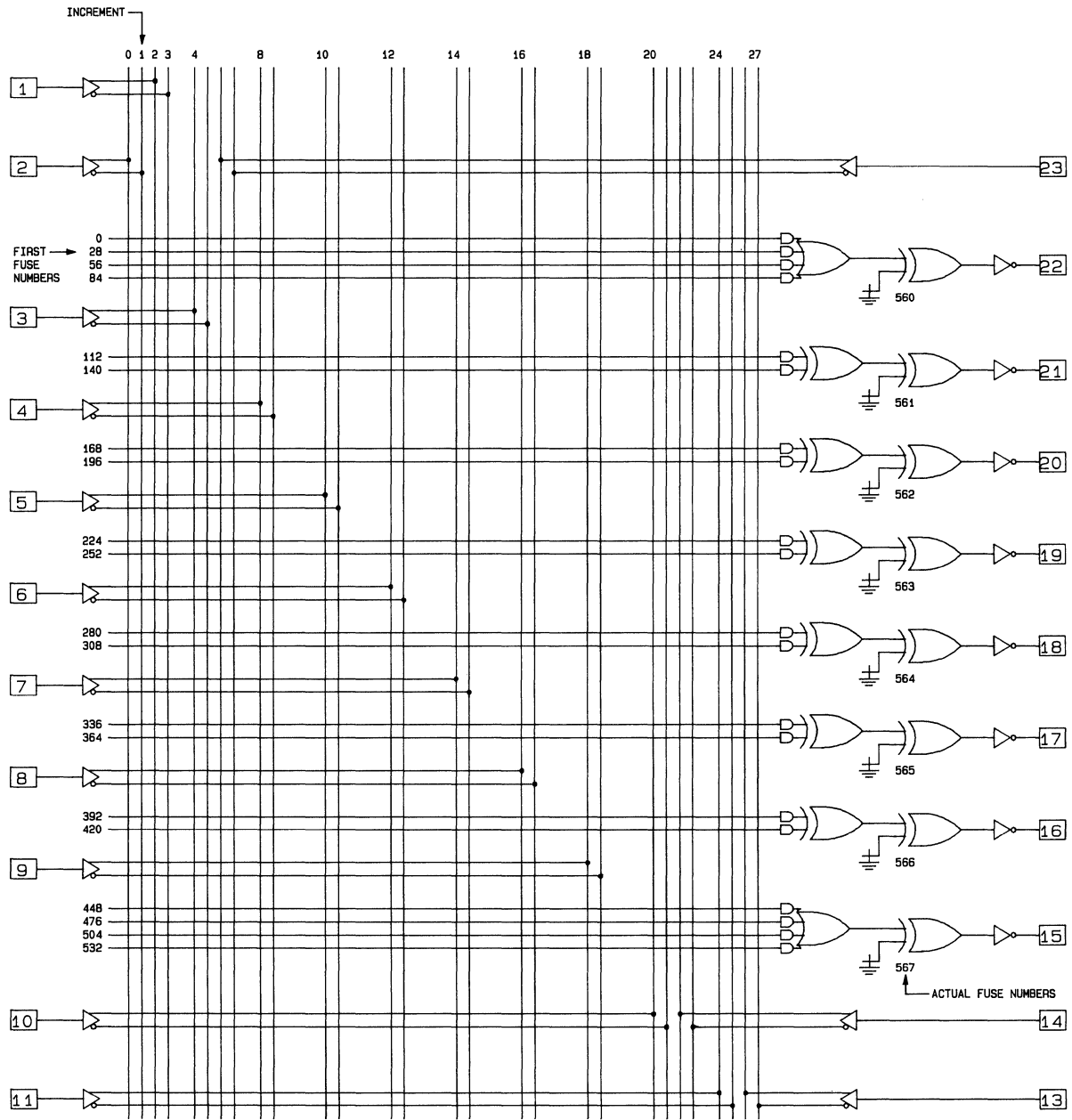
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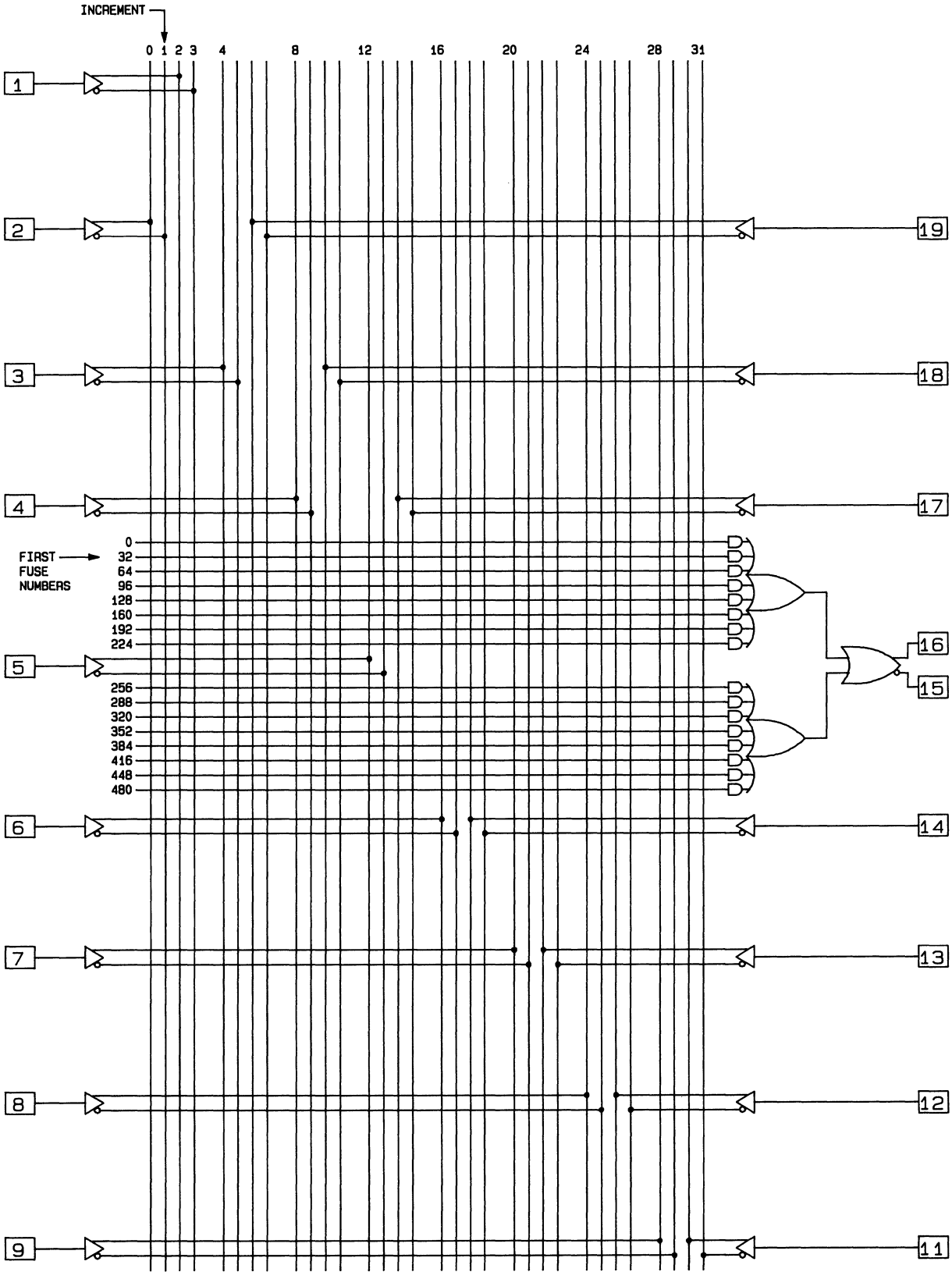
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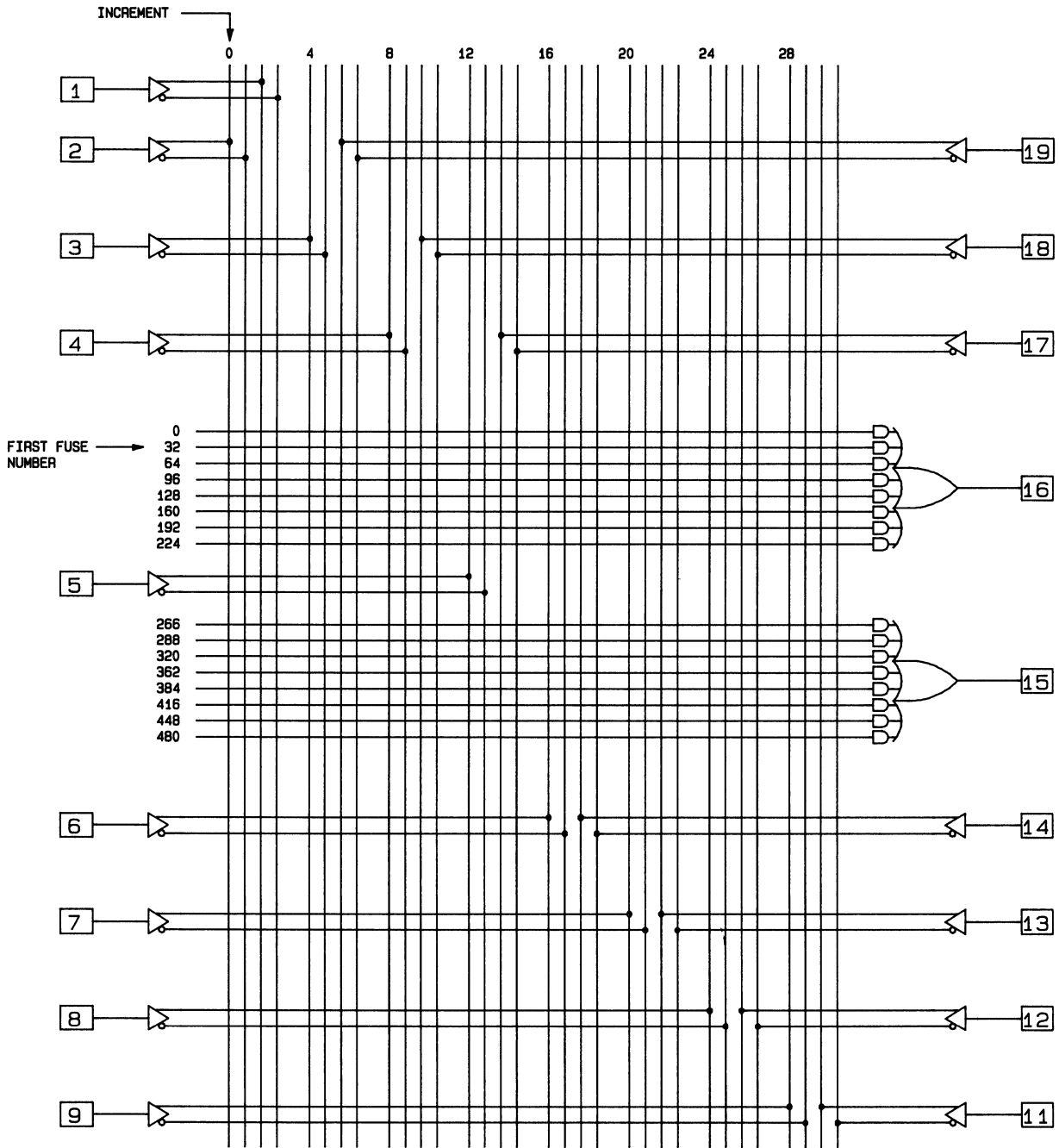
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NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

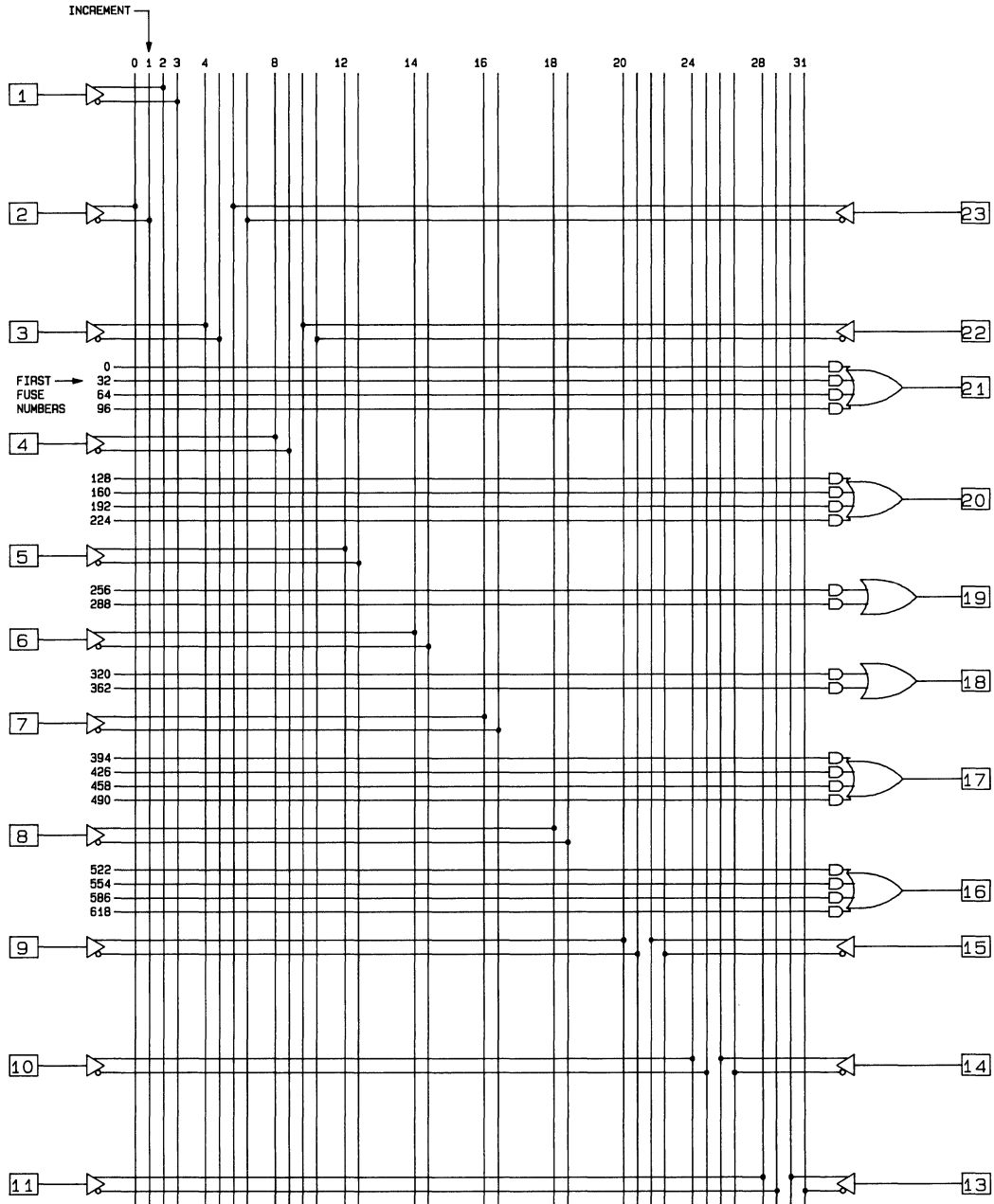


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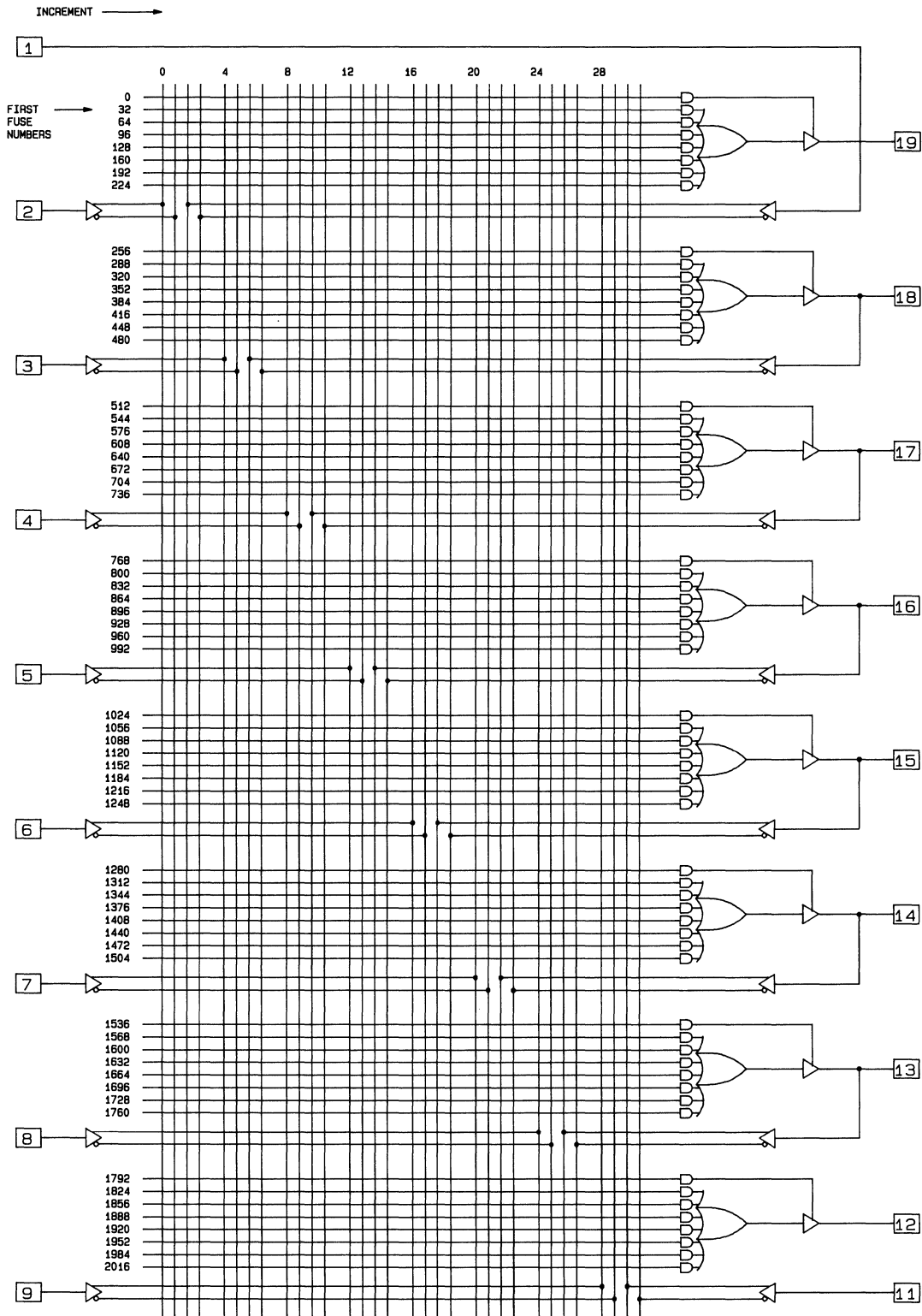


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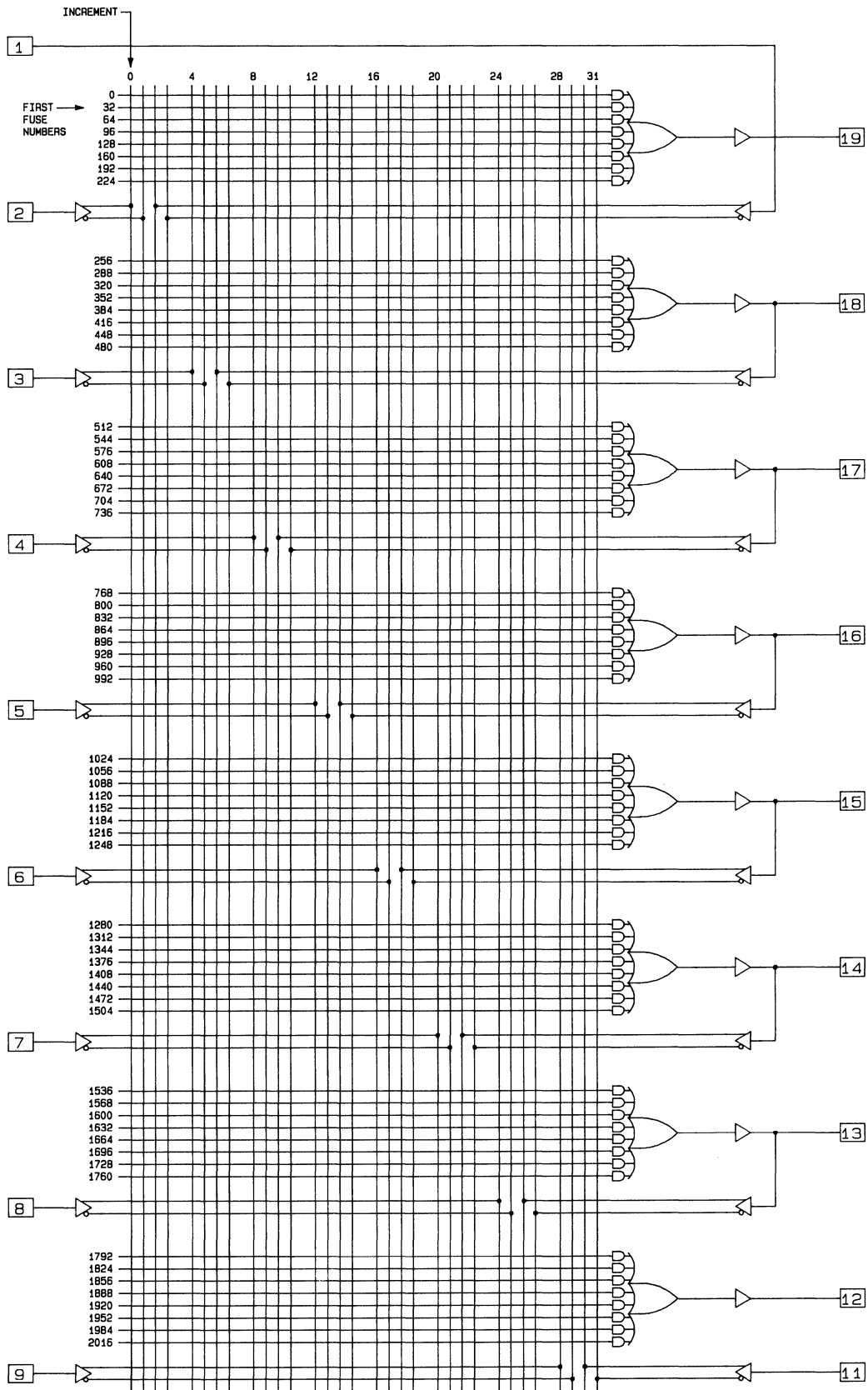
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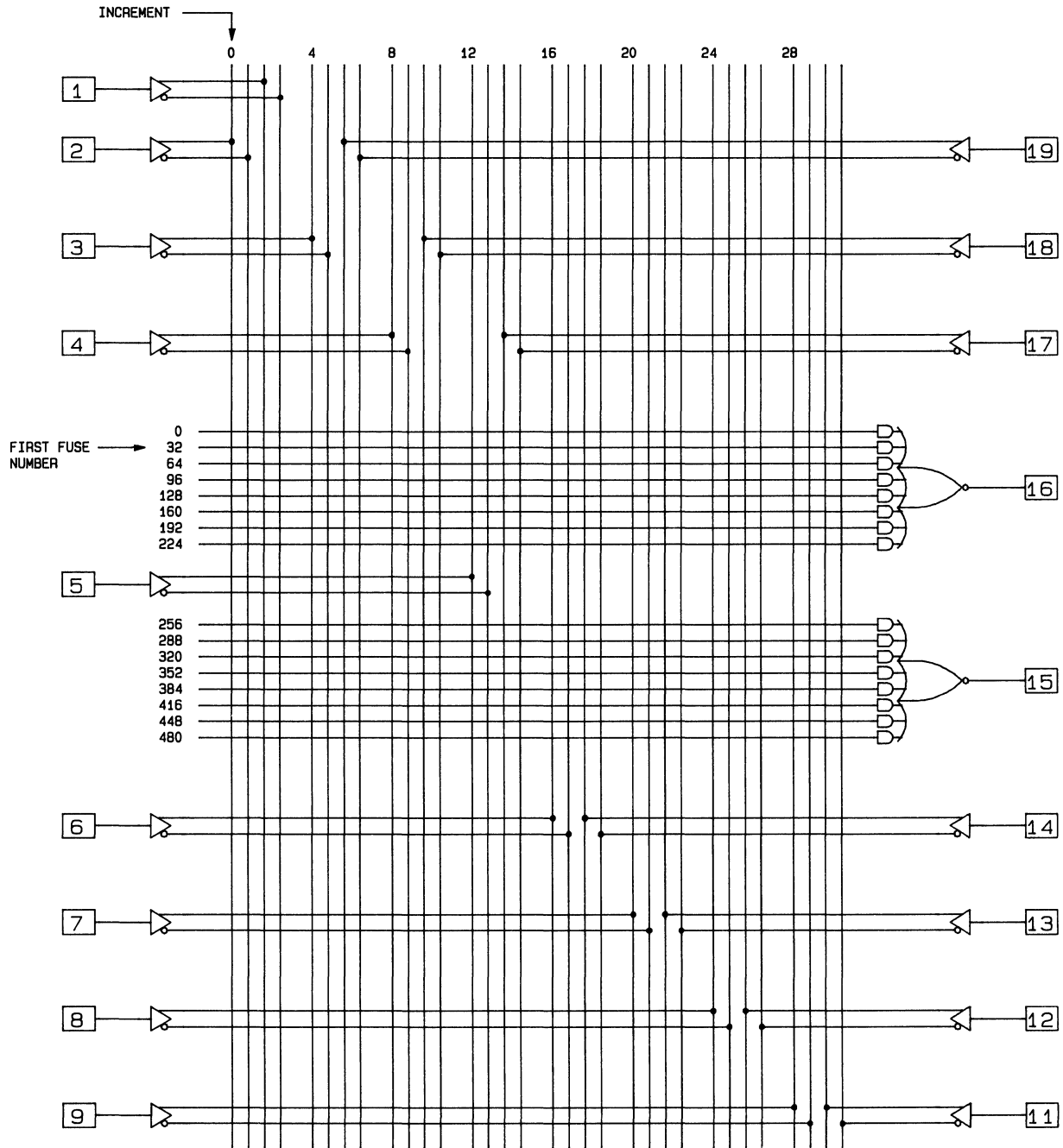
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Data I/O Corporation

Data I/O Corporation

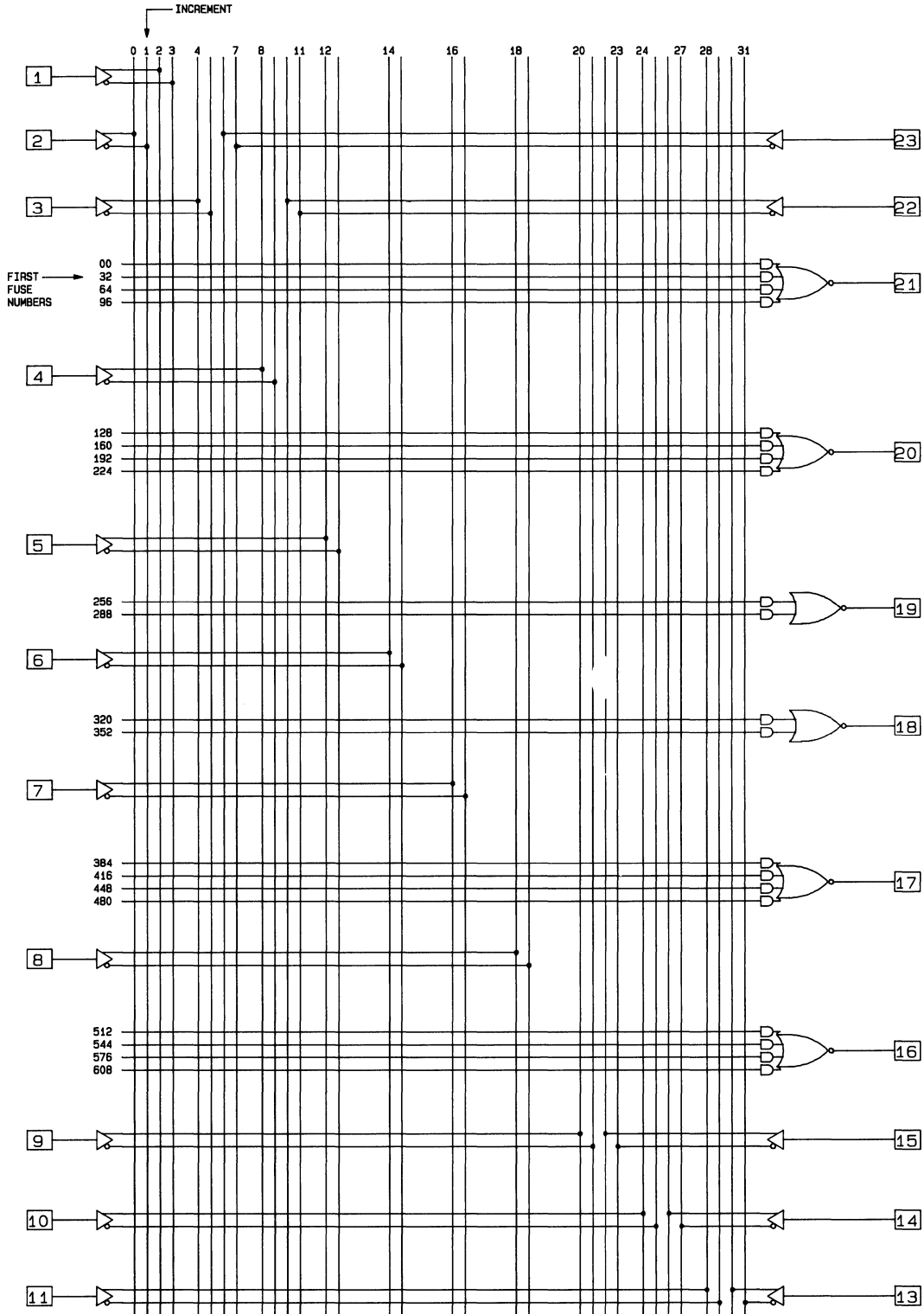


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

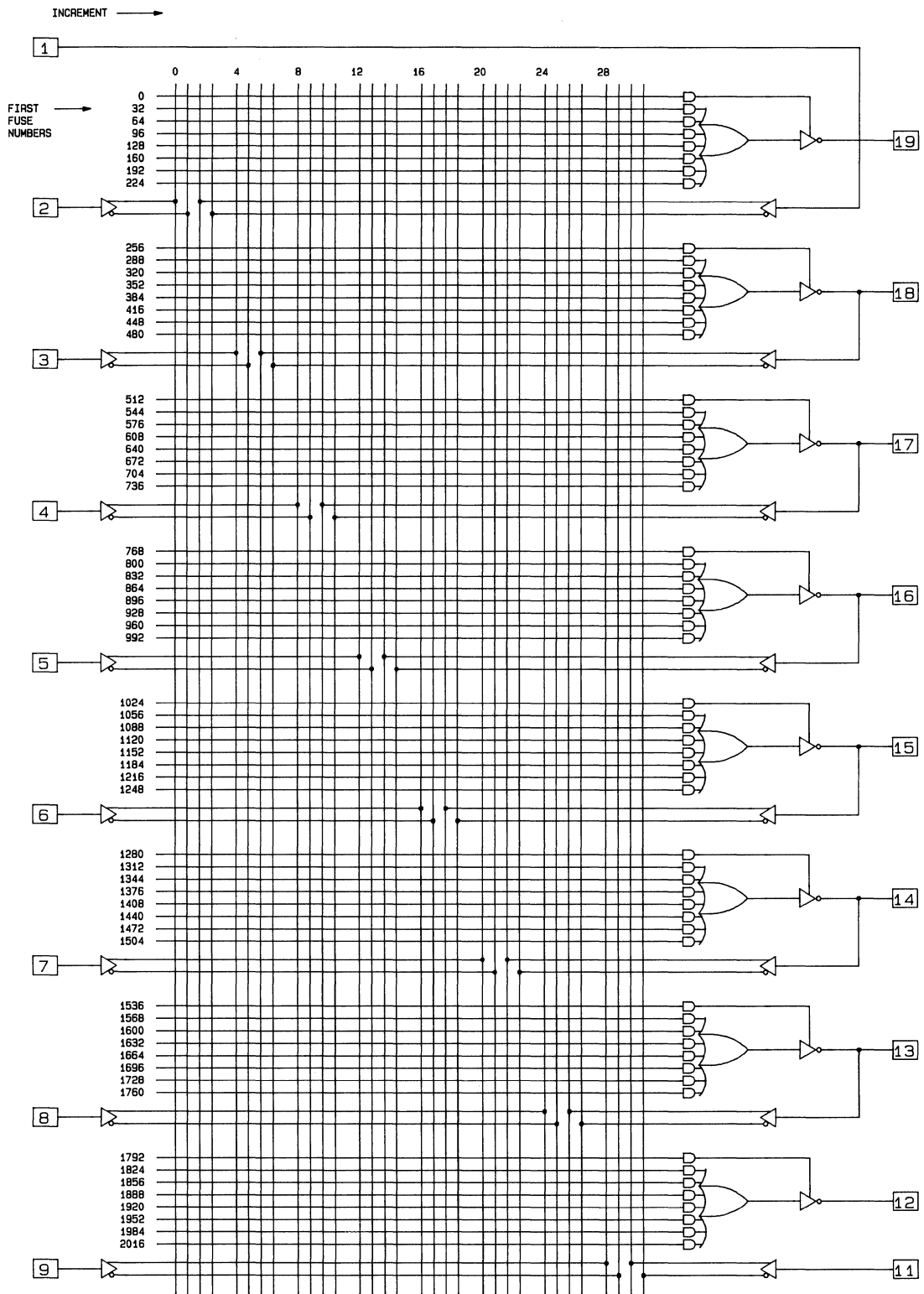


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

Data I/O Corporation

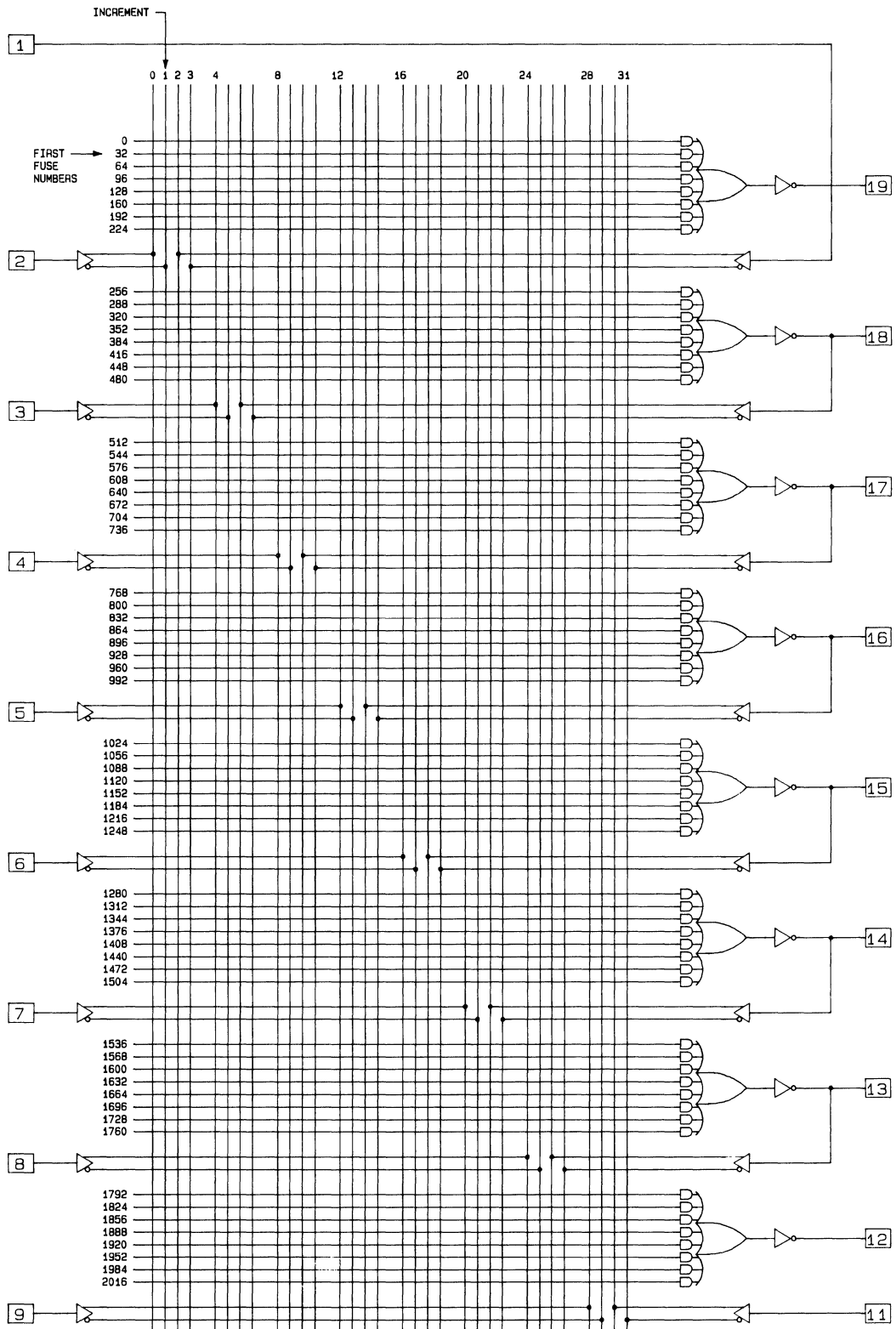


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

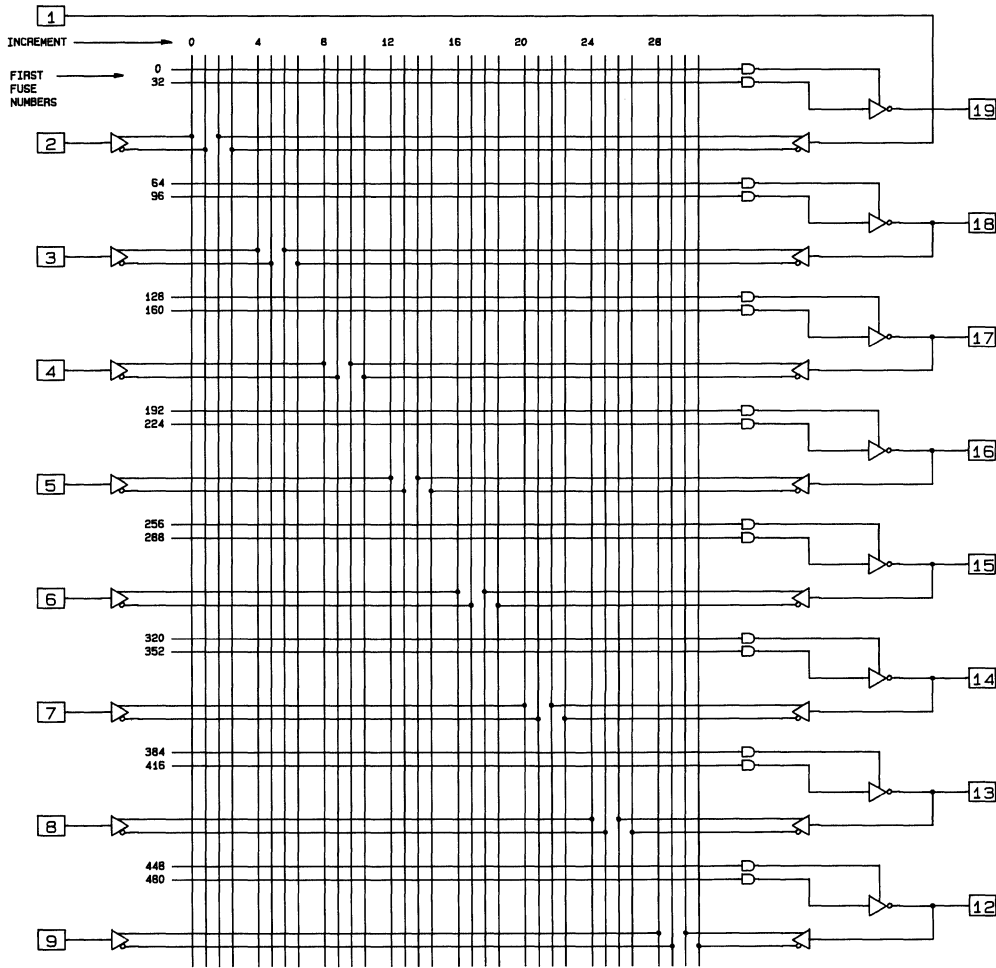


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

Data I/O Corporation



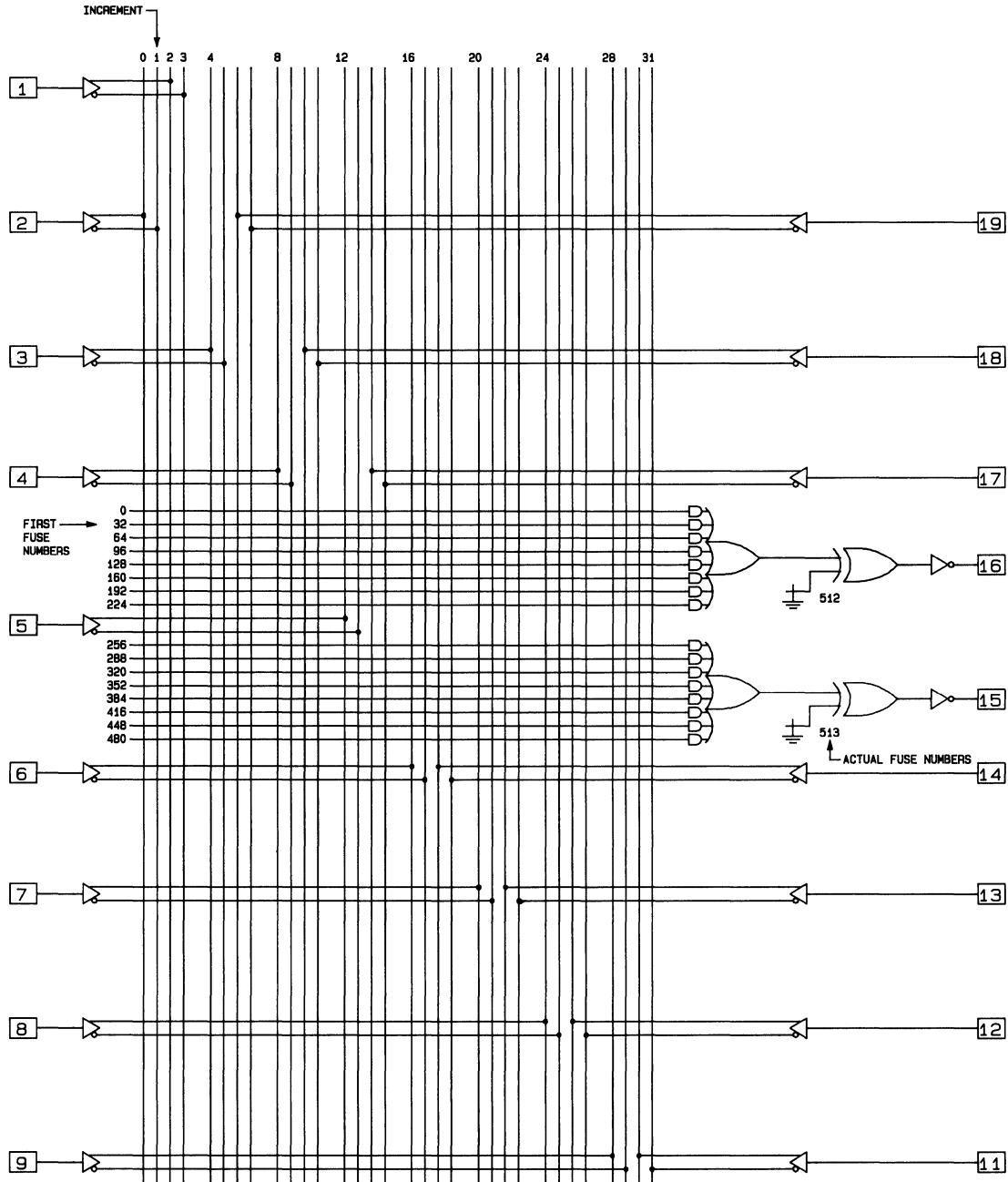
NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT



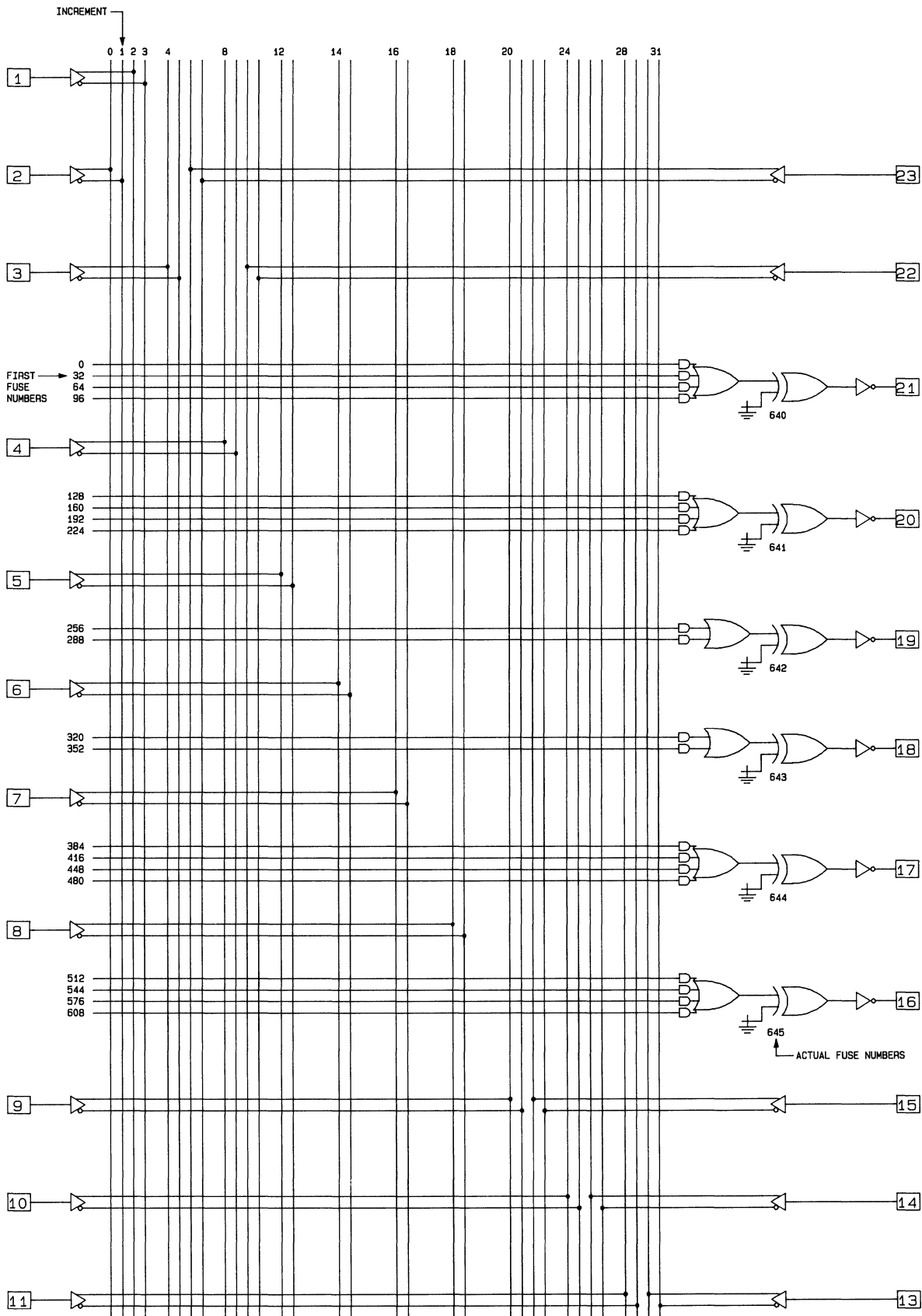
FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT



Data I/O Corporation

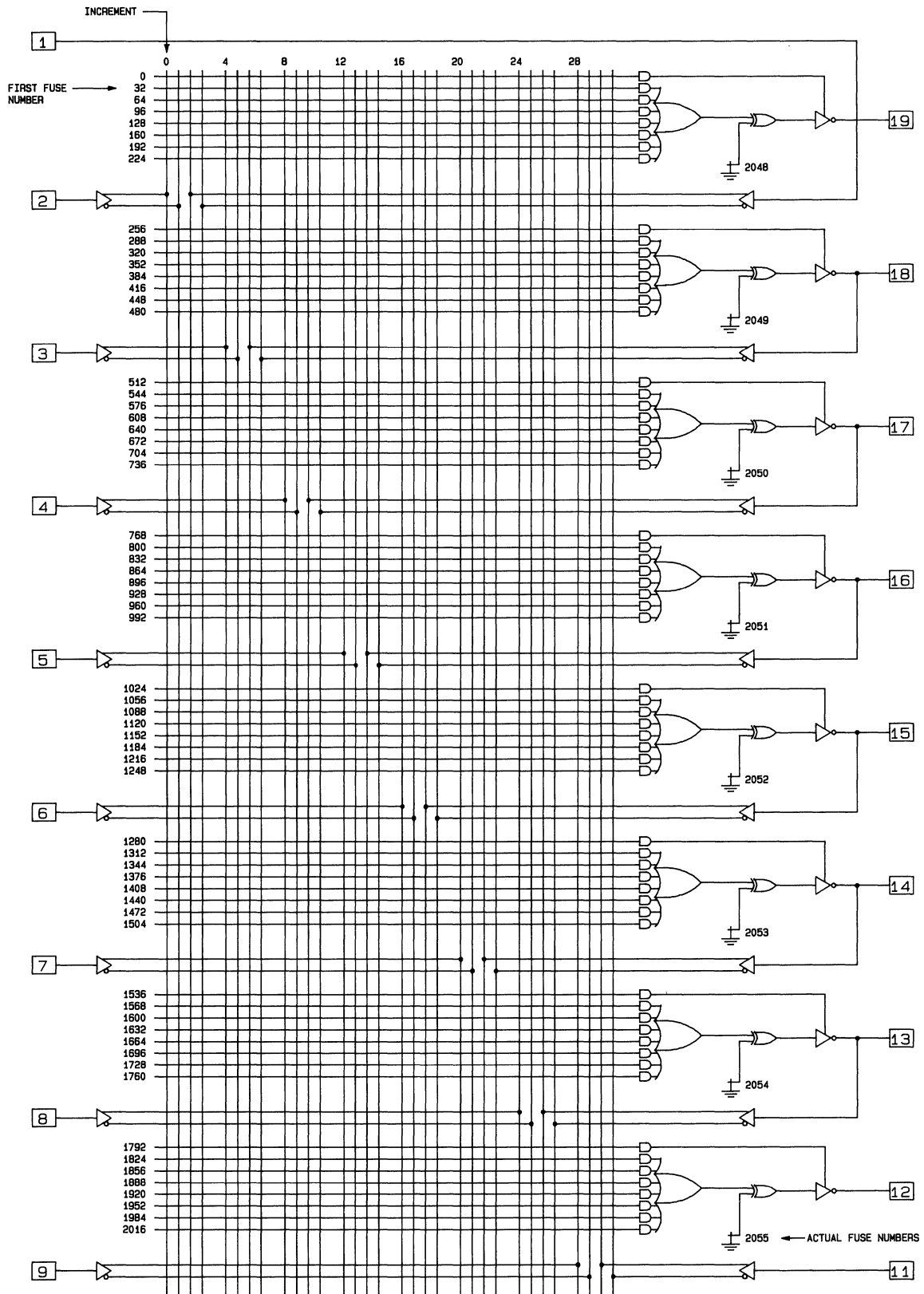


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

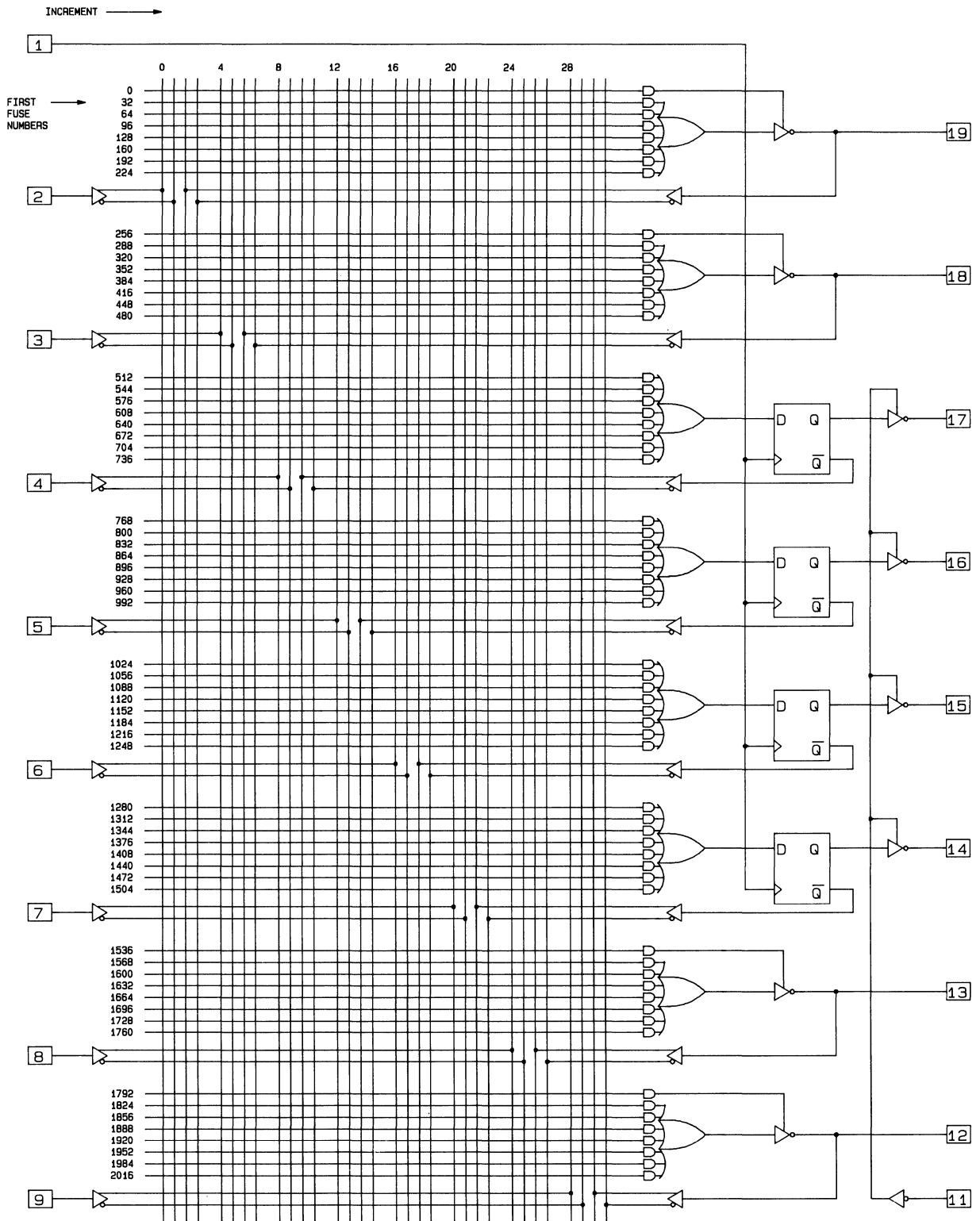


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

Data I/O Corporation

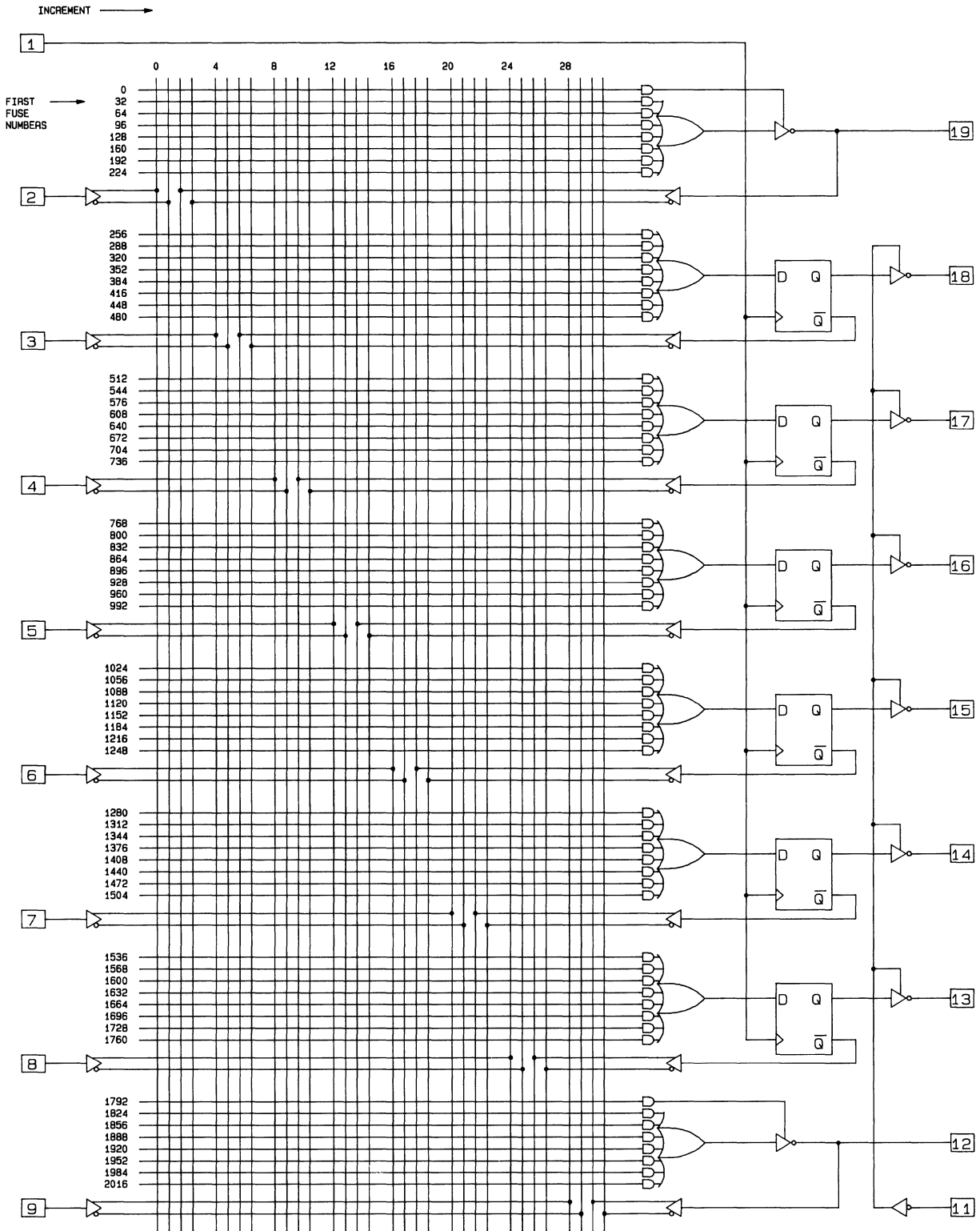


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

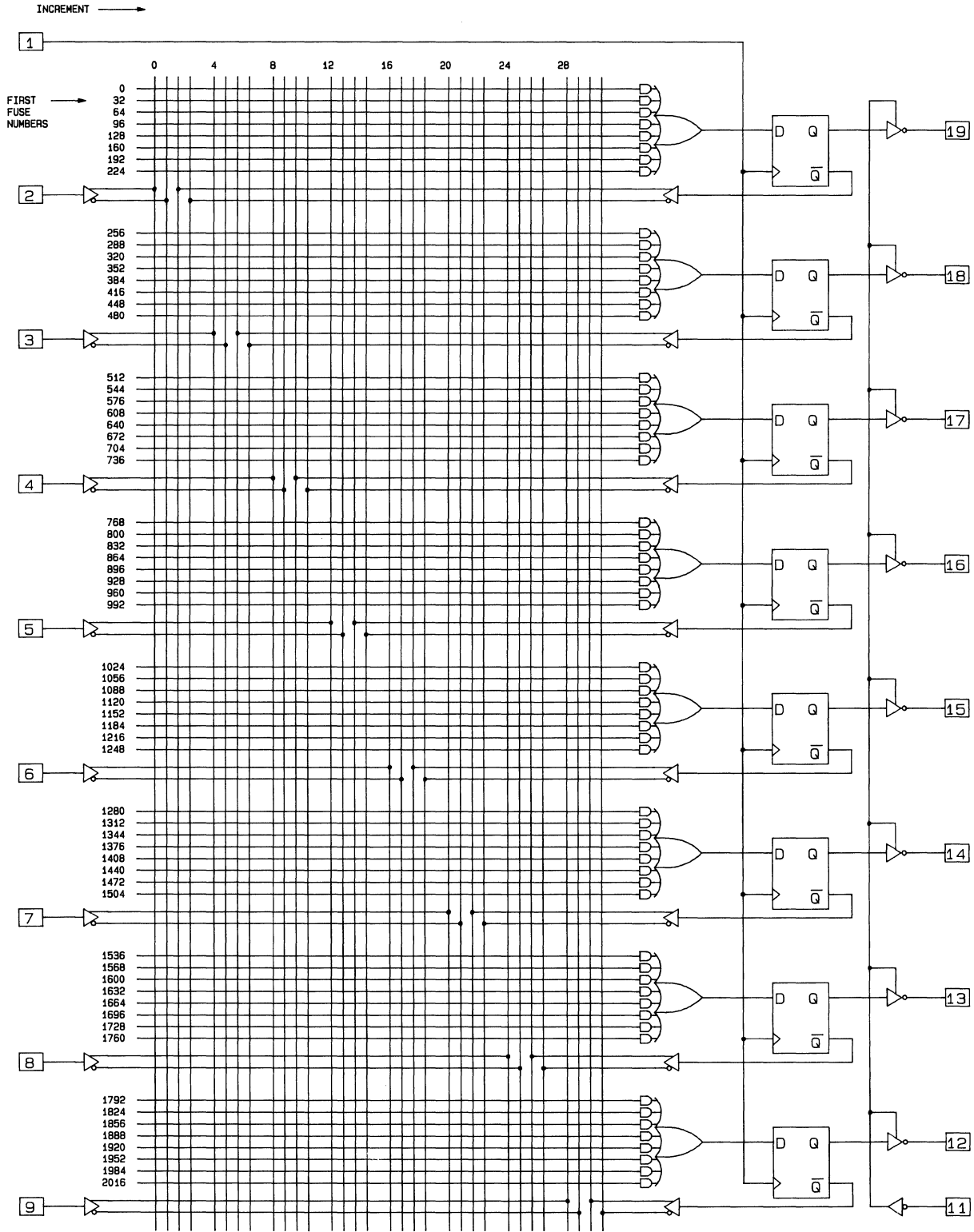


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

Data I/O Corporation

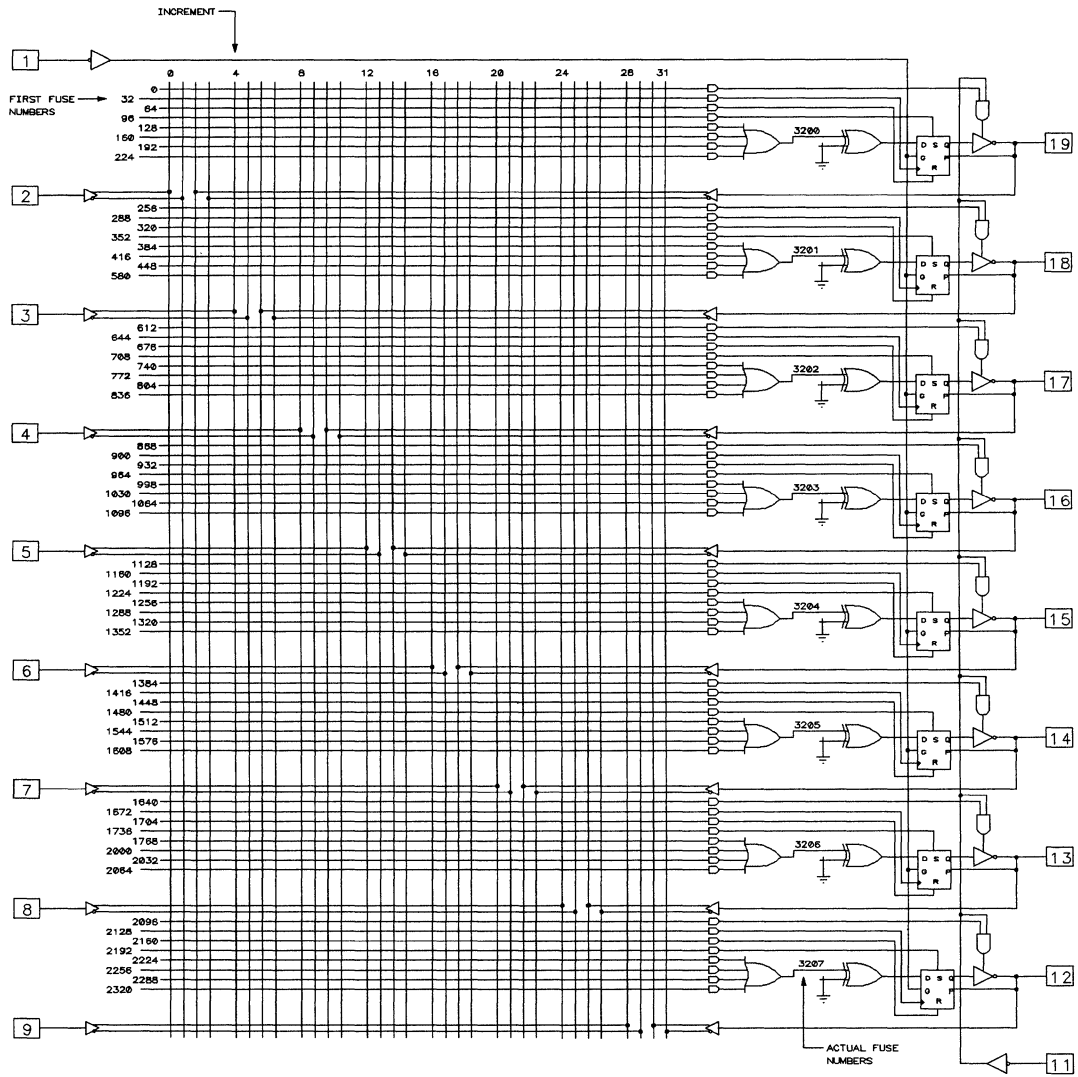


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

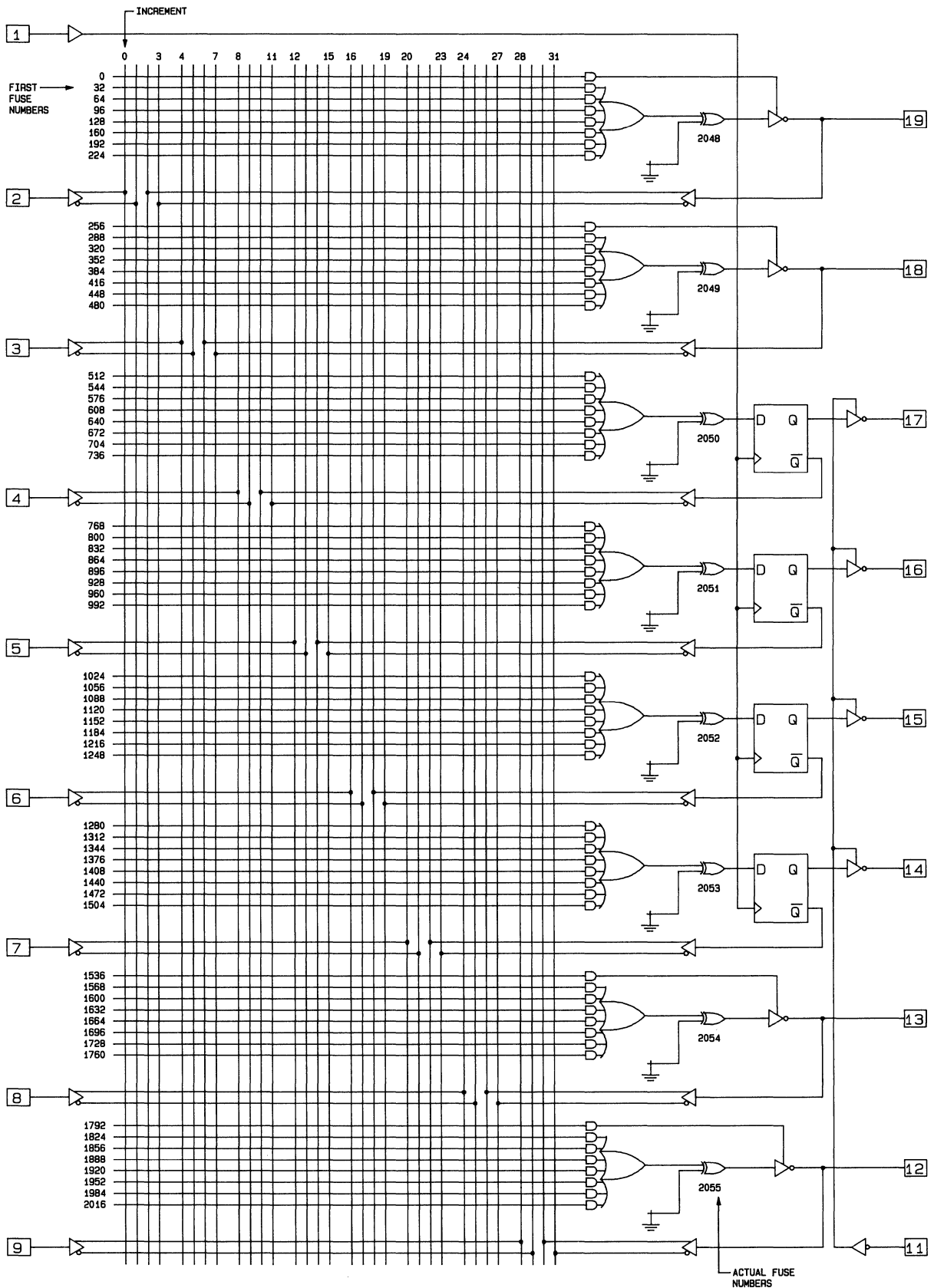


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

Data I/O Corporation



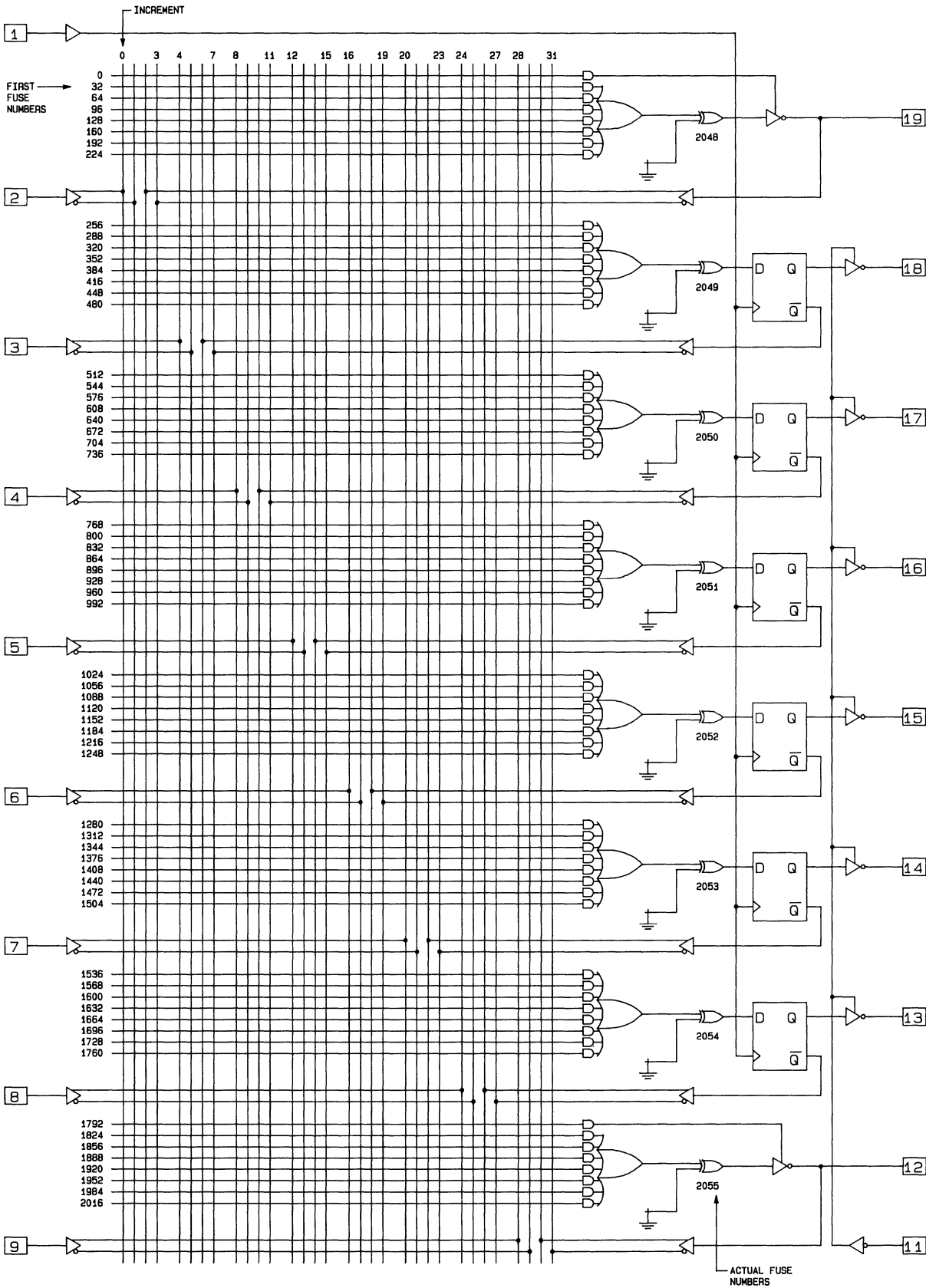
NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT



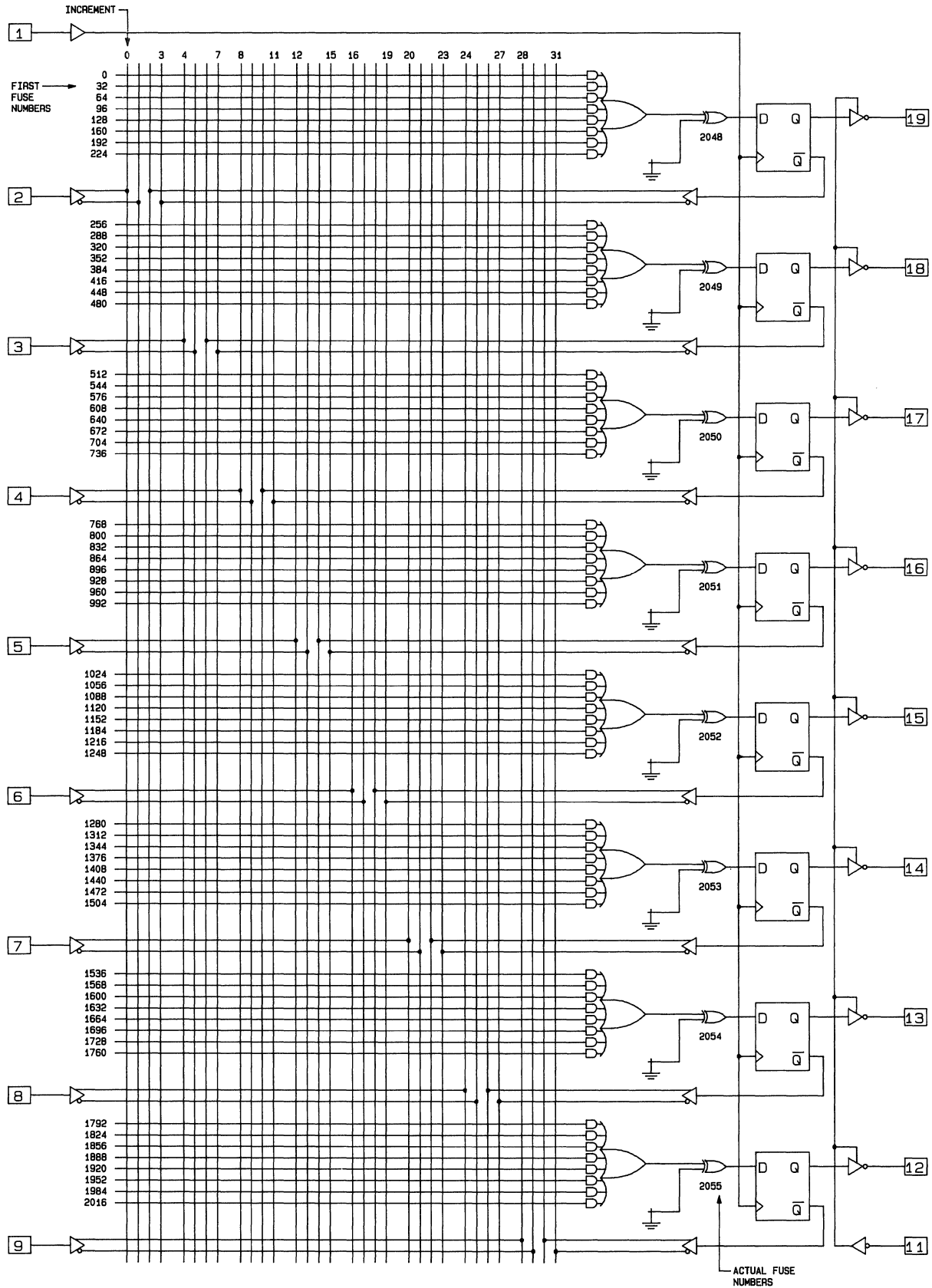
NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT



Data I/O Corporation

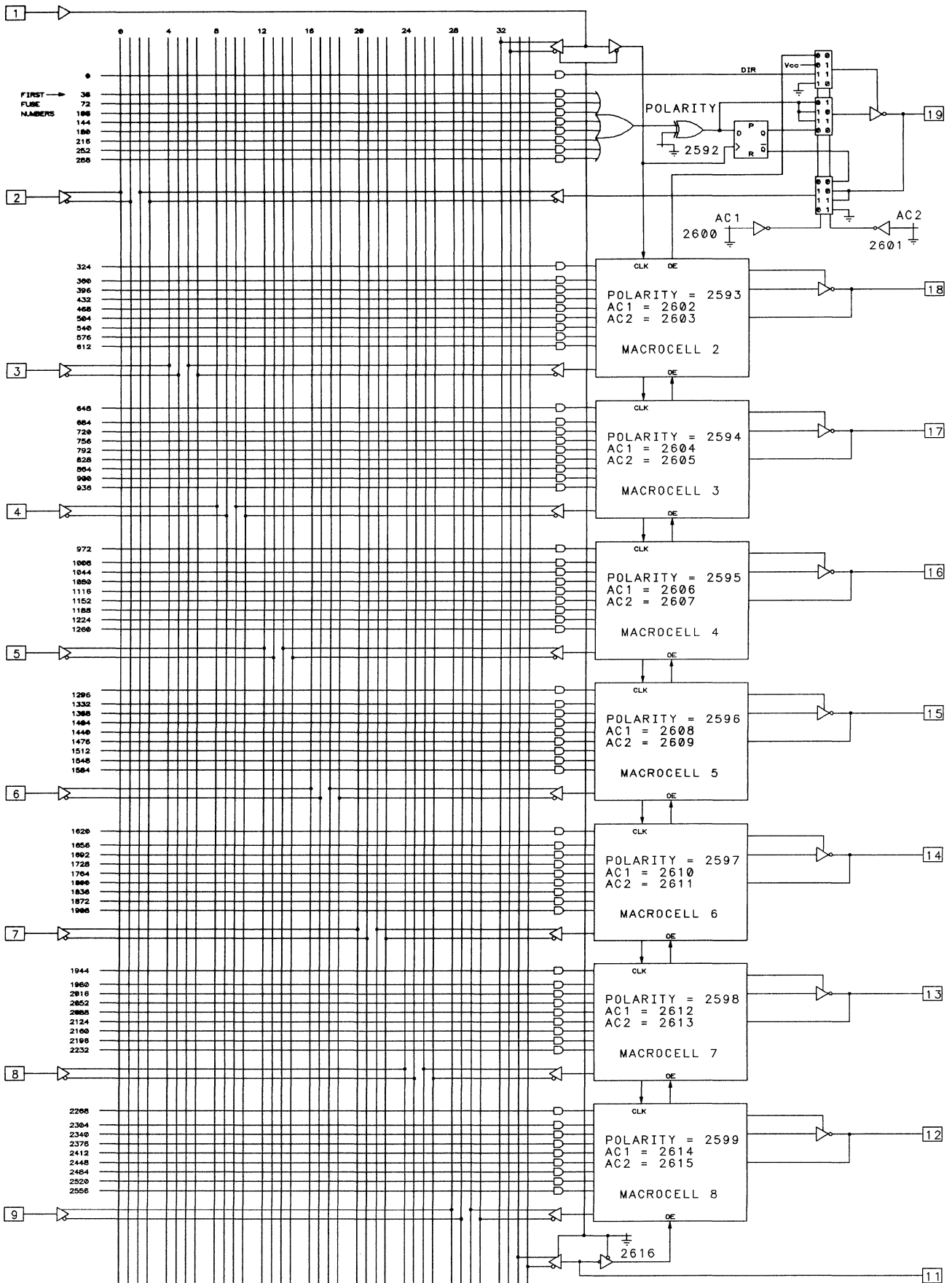


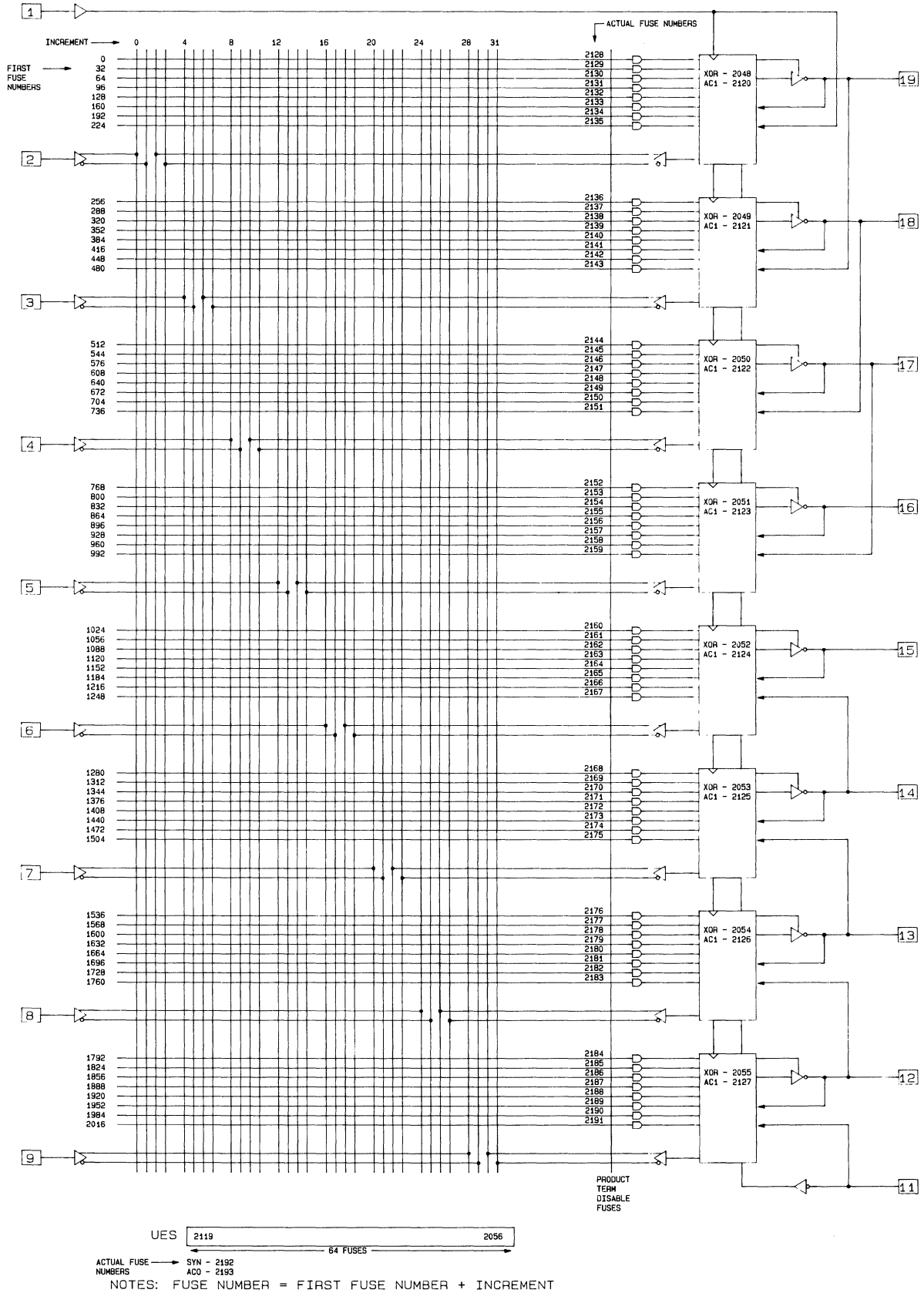
NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT



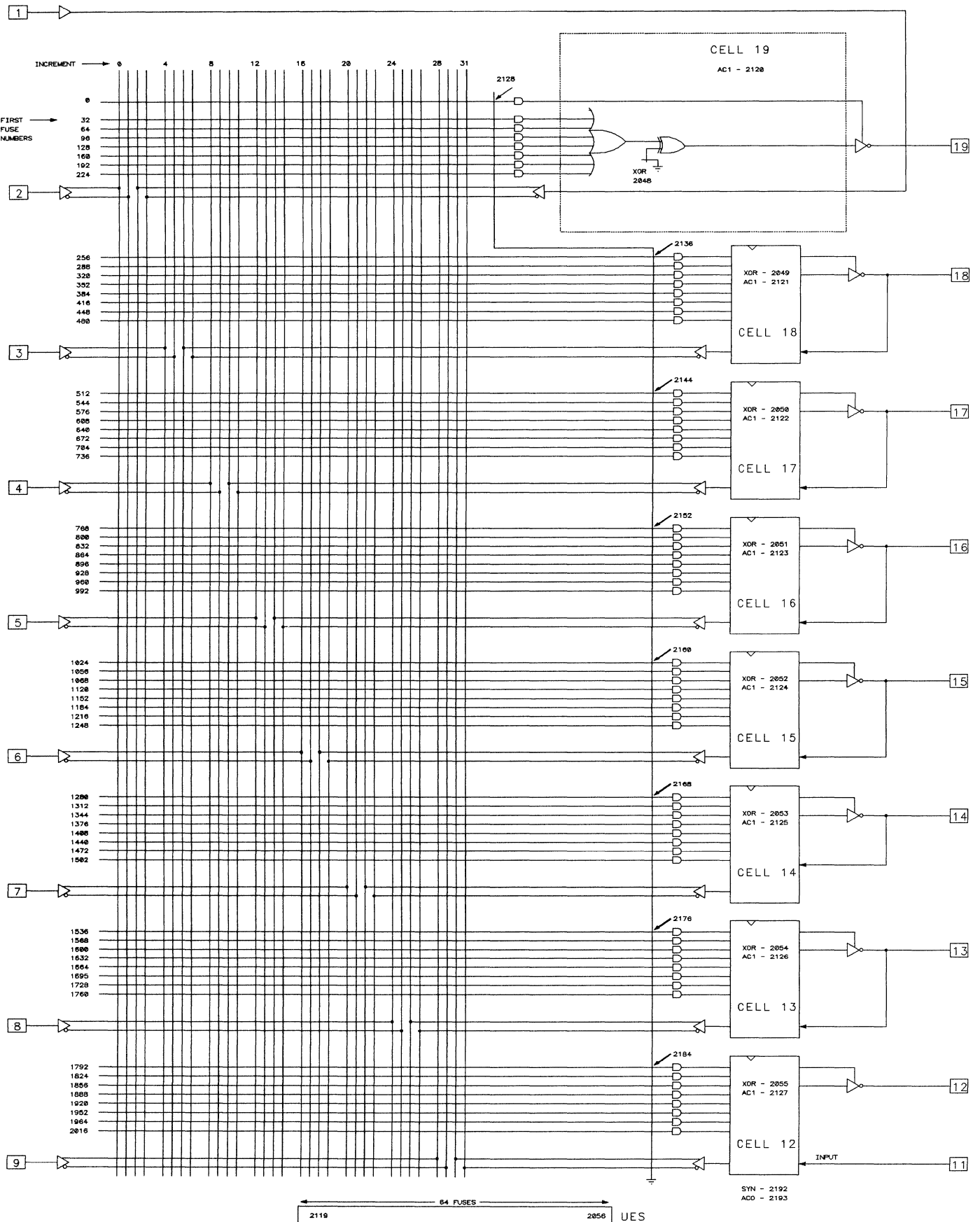
NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

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Data I/O

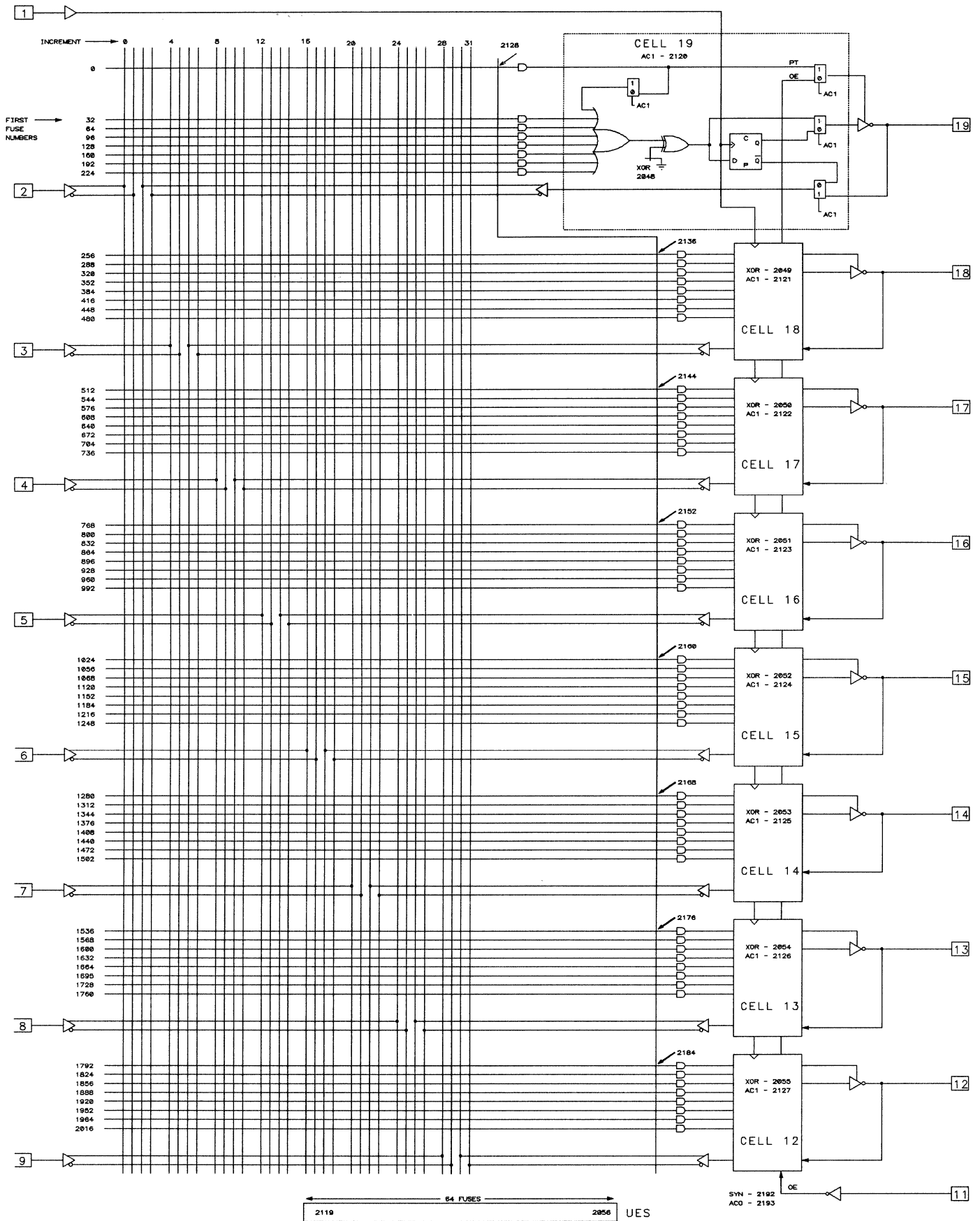




Data I/O Corporation



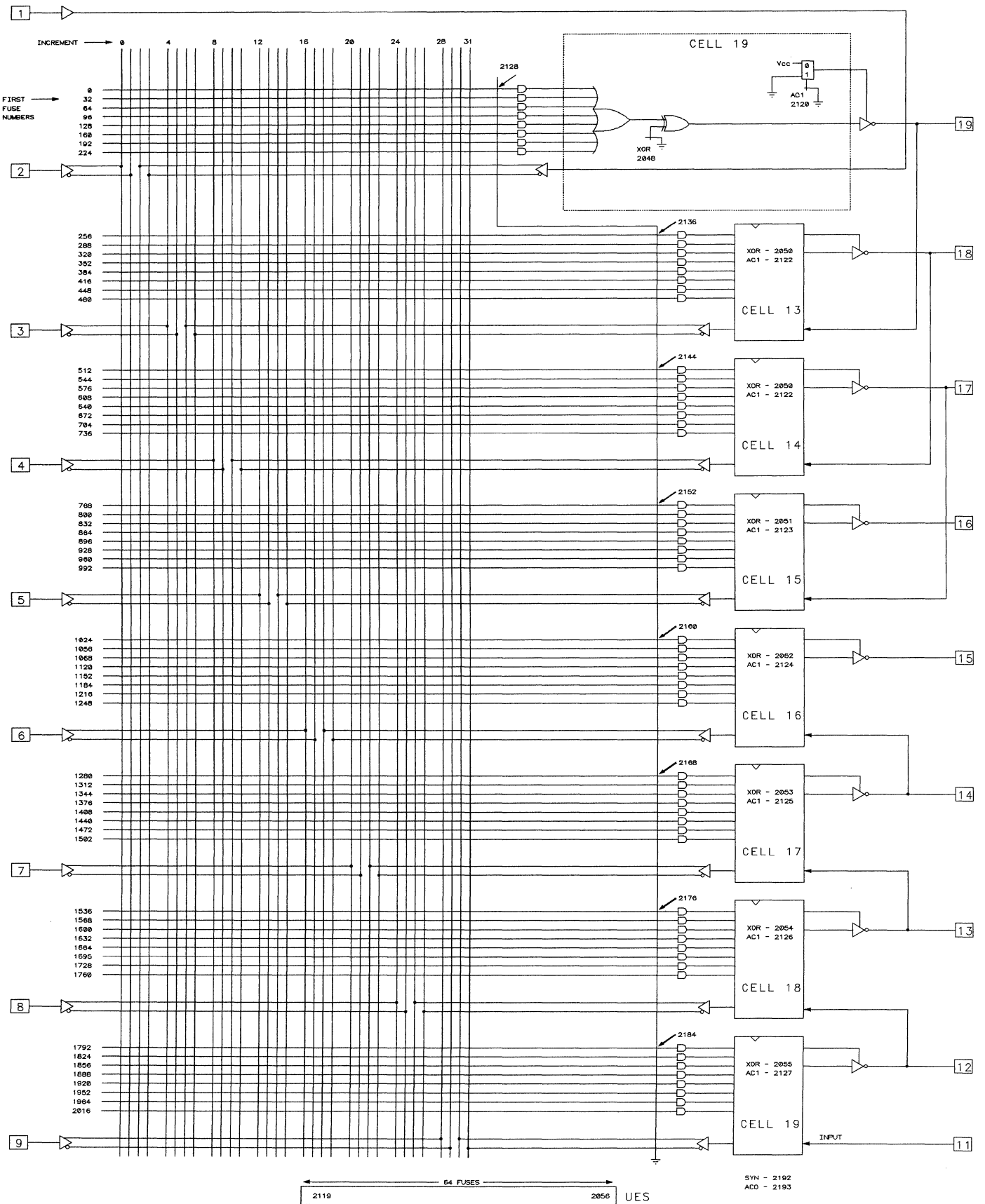
NOTES: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT  
 SYN = 1, AC0 = 1  
 FUSES 2128 - 2191 DISABLE PRODUCT TERMS



NOTES: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT  
 SYN = 0, AC0 = 1  
 FUSES 2128 - 2191 DISABLE PRODUCT TERMS

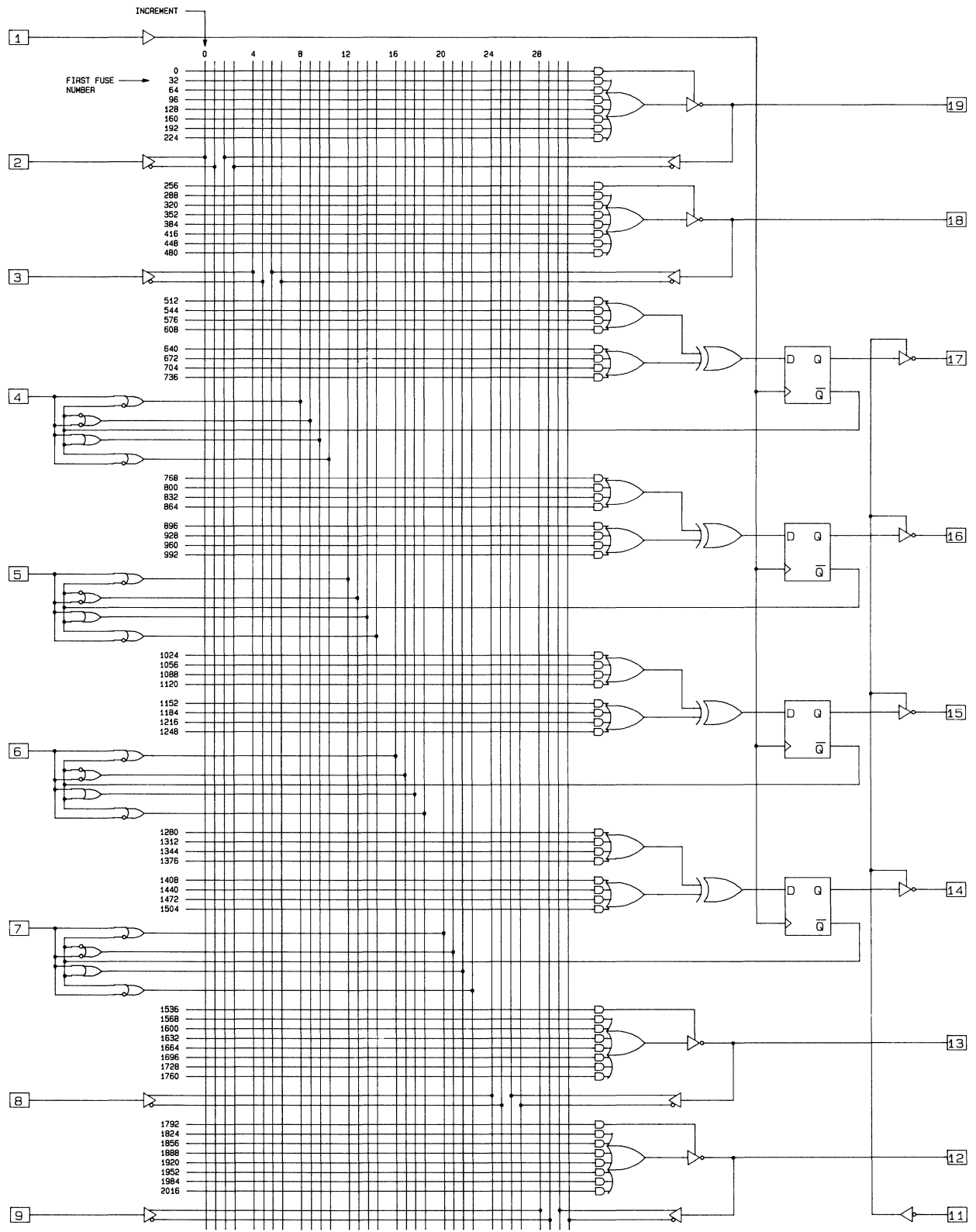
Data I/O Corporation

Data I/O Corporation



NOTES: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT  
 SYN = 1, AC0 = 0  
 FUSES 2128 - 2191 DISABLE PRODUCT TERMS

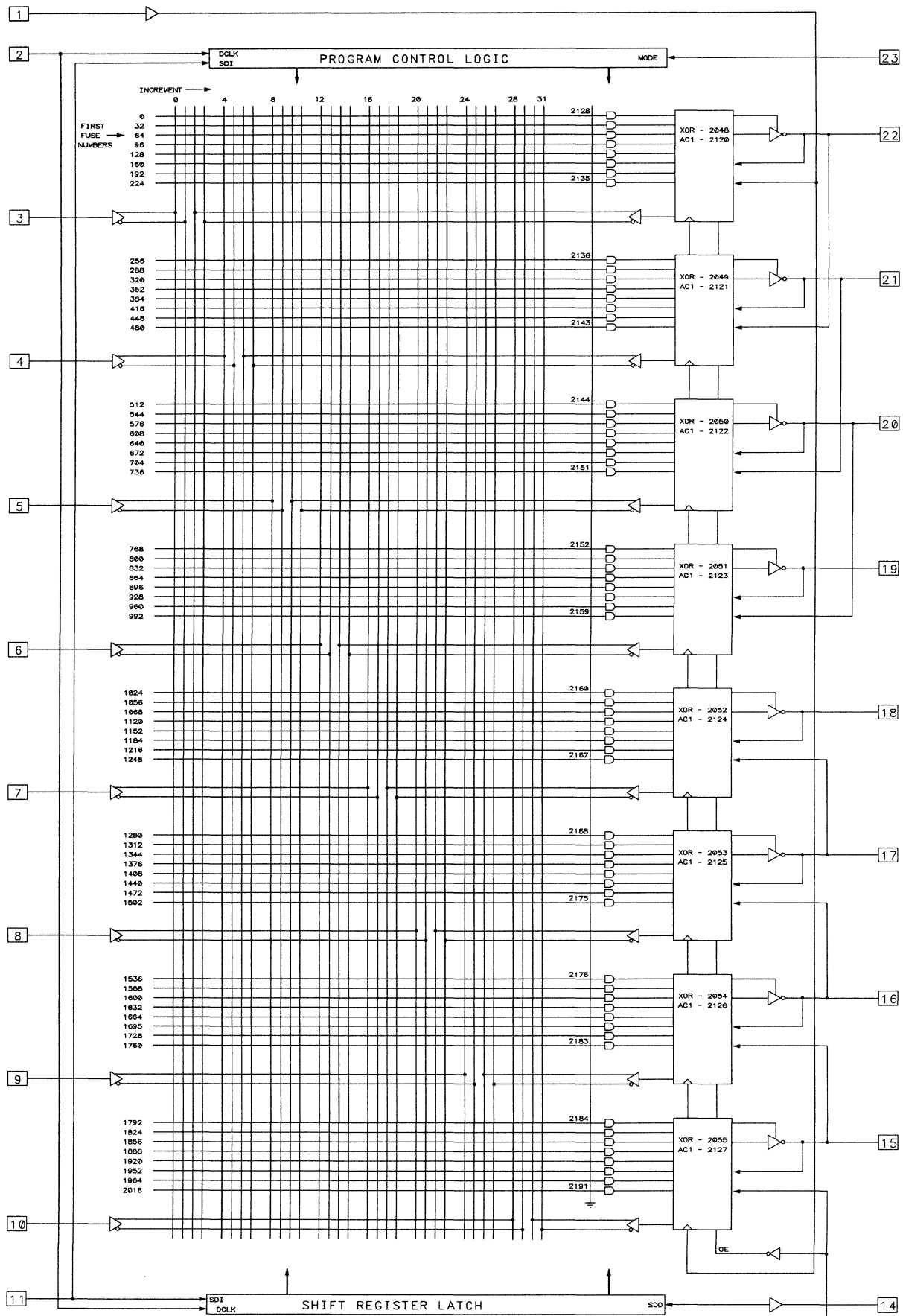
SYN - 2192  
 ACC - 2193



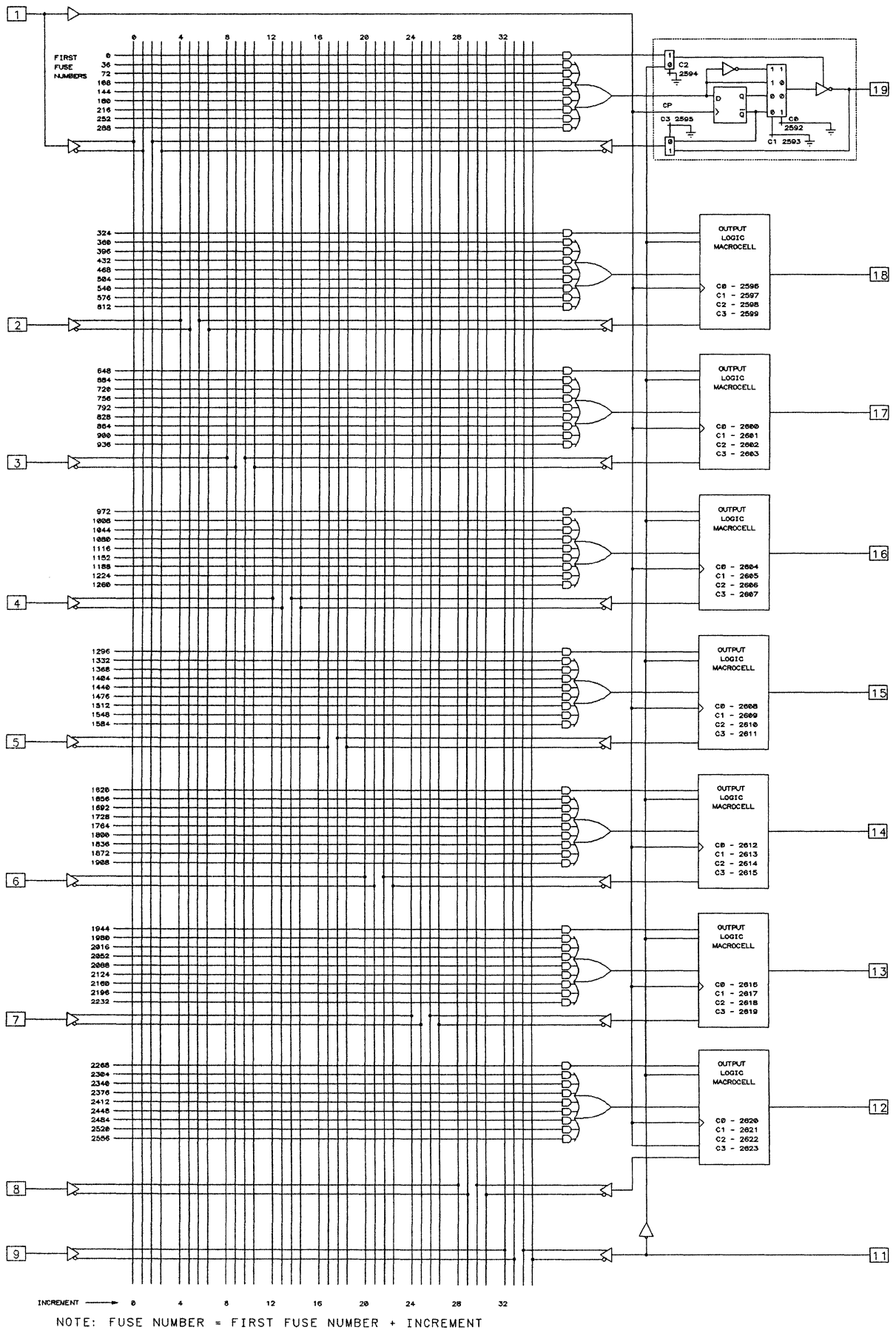
NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT



Data I/O Corporation

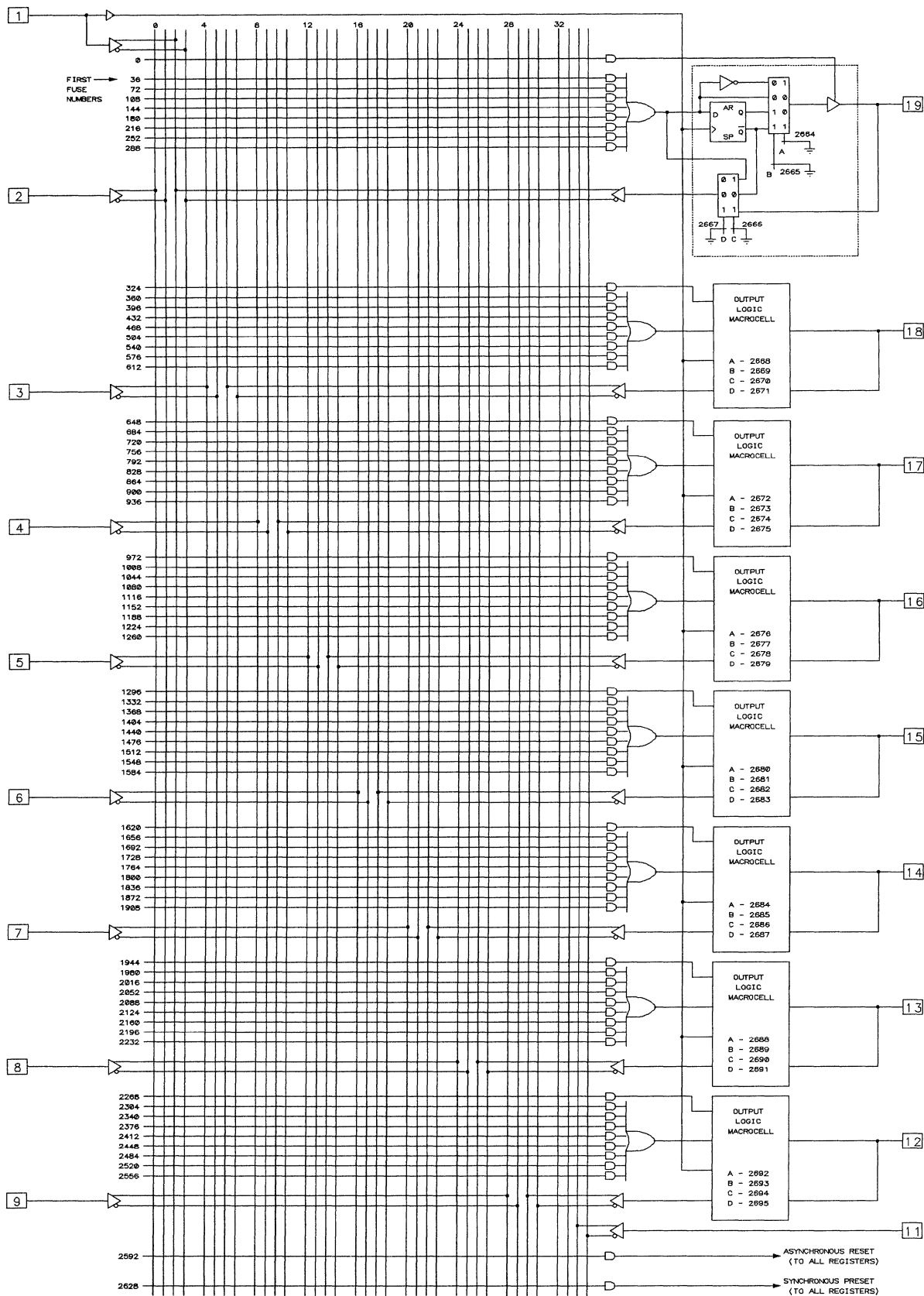


NOTES: FOR MACROCELL DETAILS, REFER TO P16V8 DIAGRAM  
 FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT  
 SYN = 2192, AC0 = 2193, & TC = 2194  
 FUSES 2128 - 2191 DISABLE PRODUCT TERMS



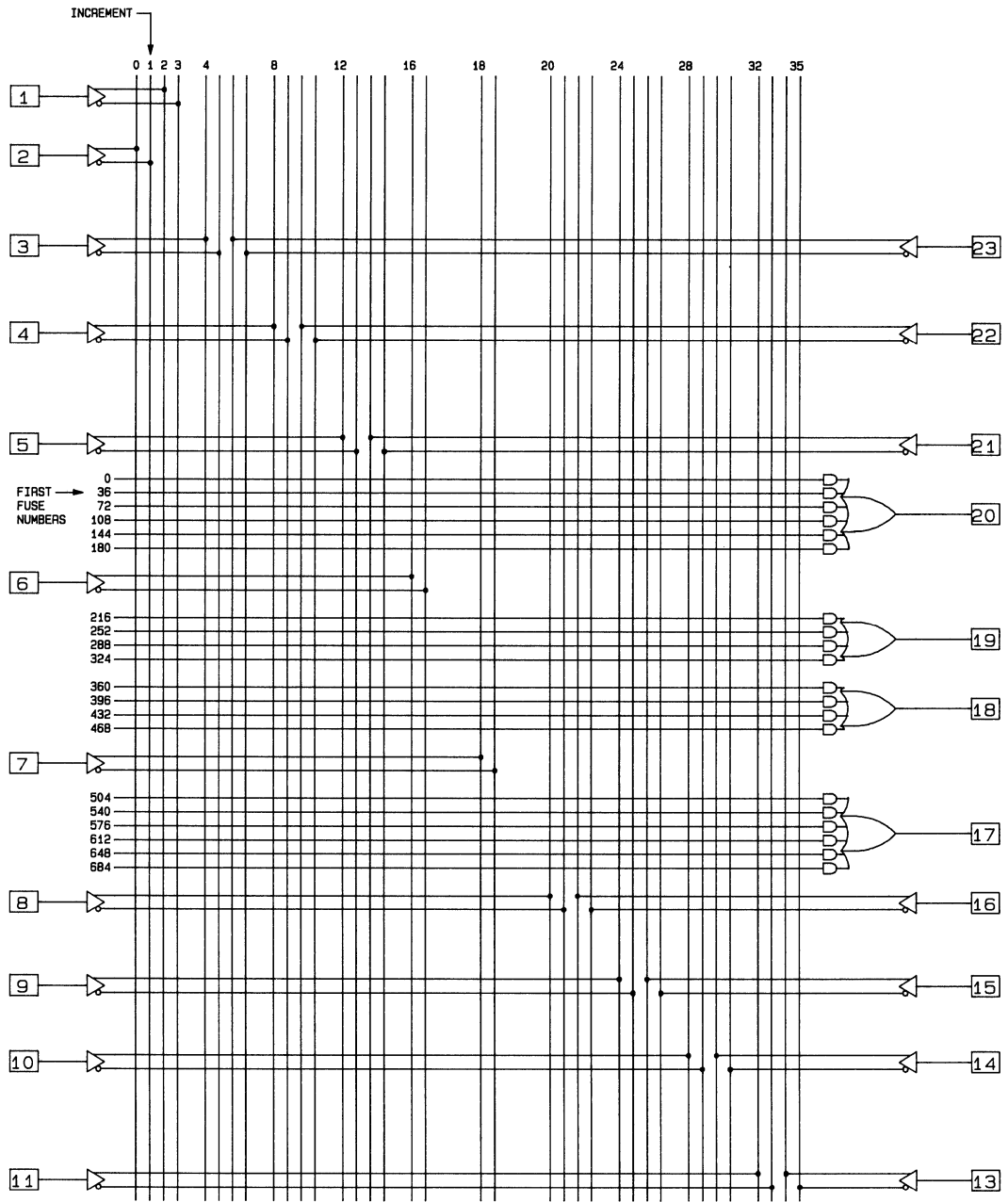
Data I/O Corporation

Data I/O Corporation



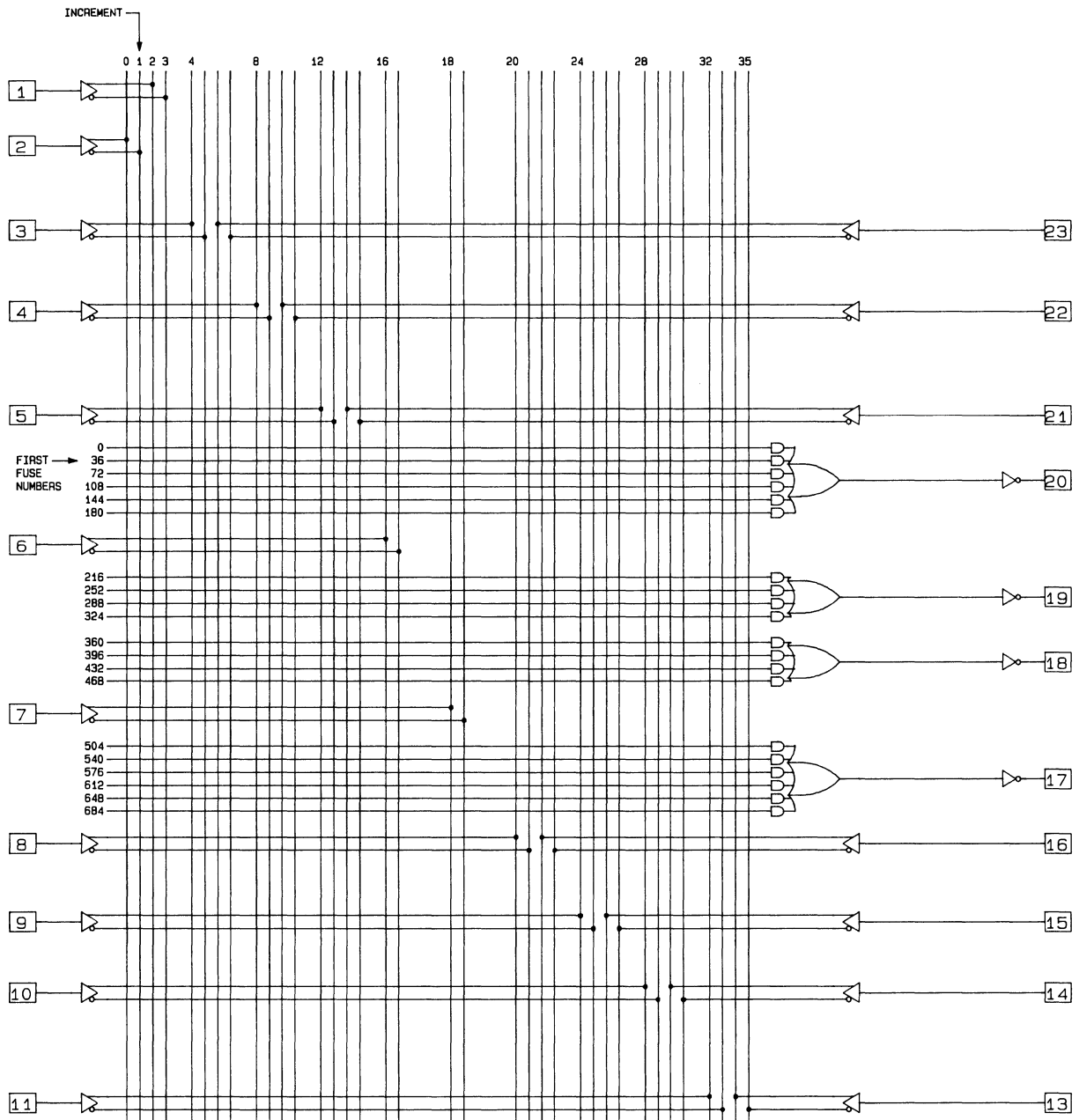
SB = SIGNATURE BITS

FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

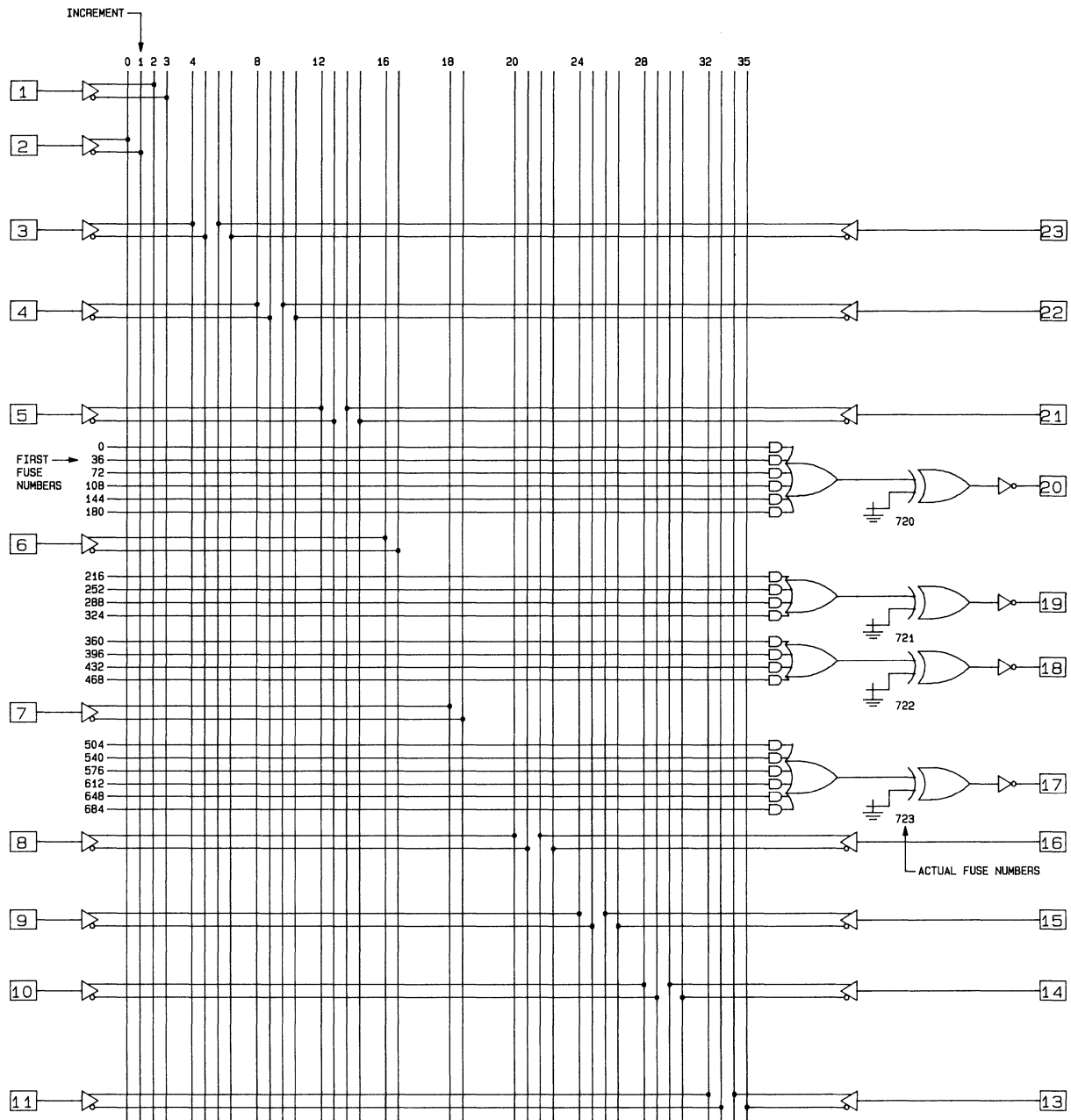


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

Data I/O Corporation

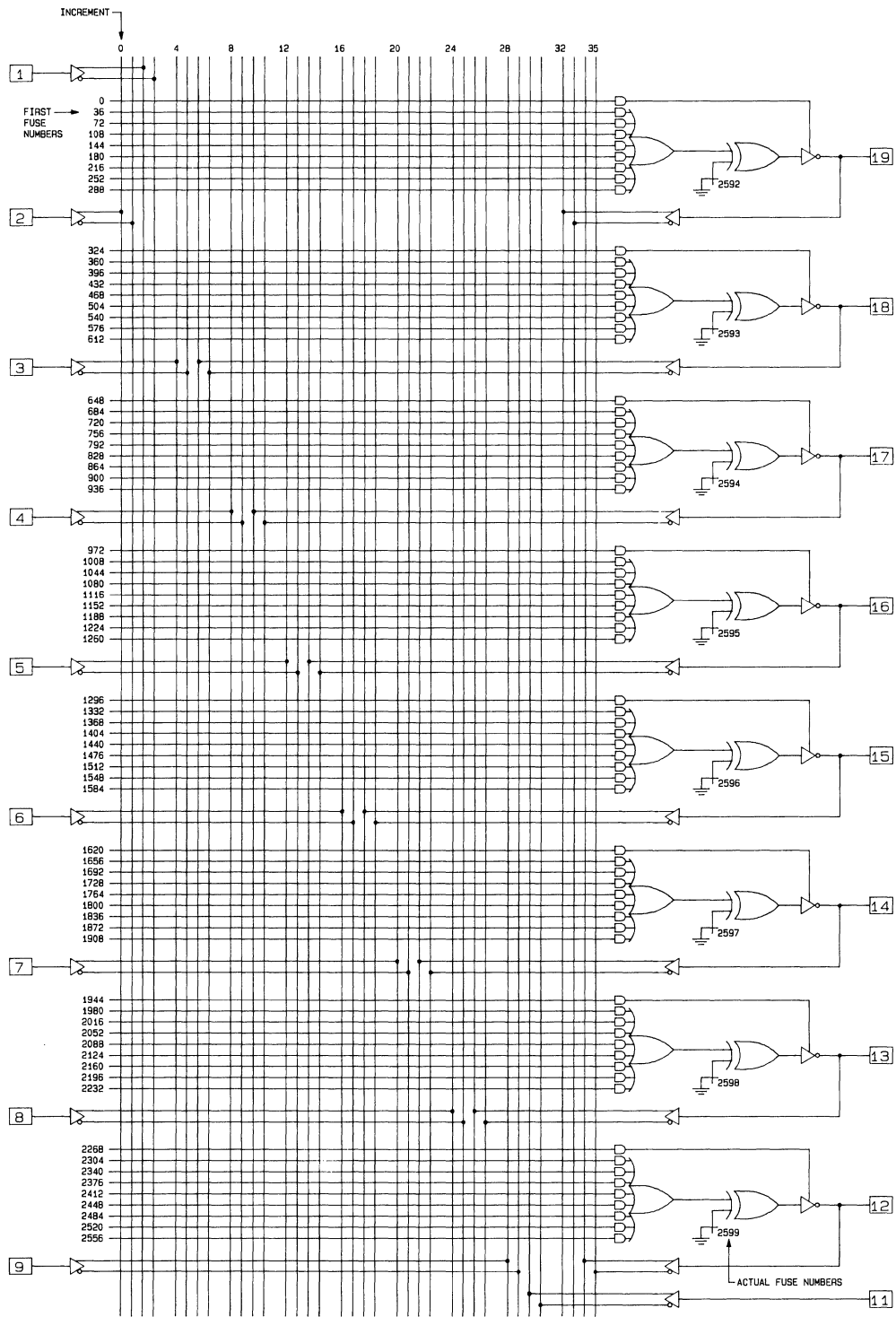


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

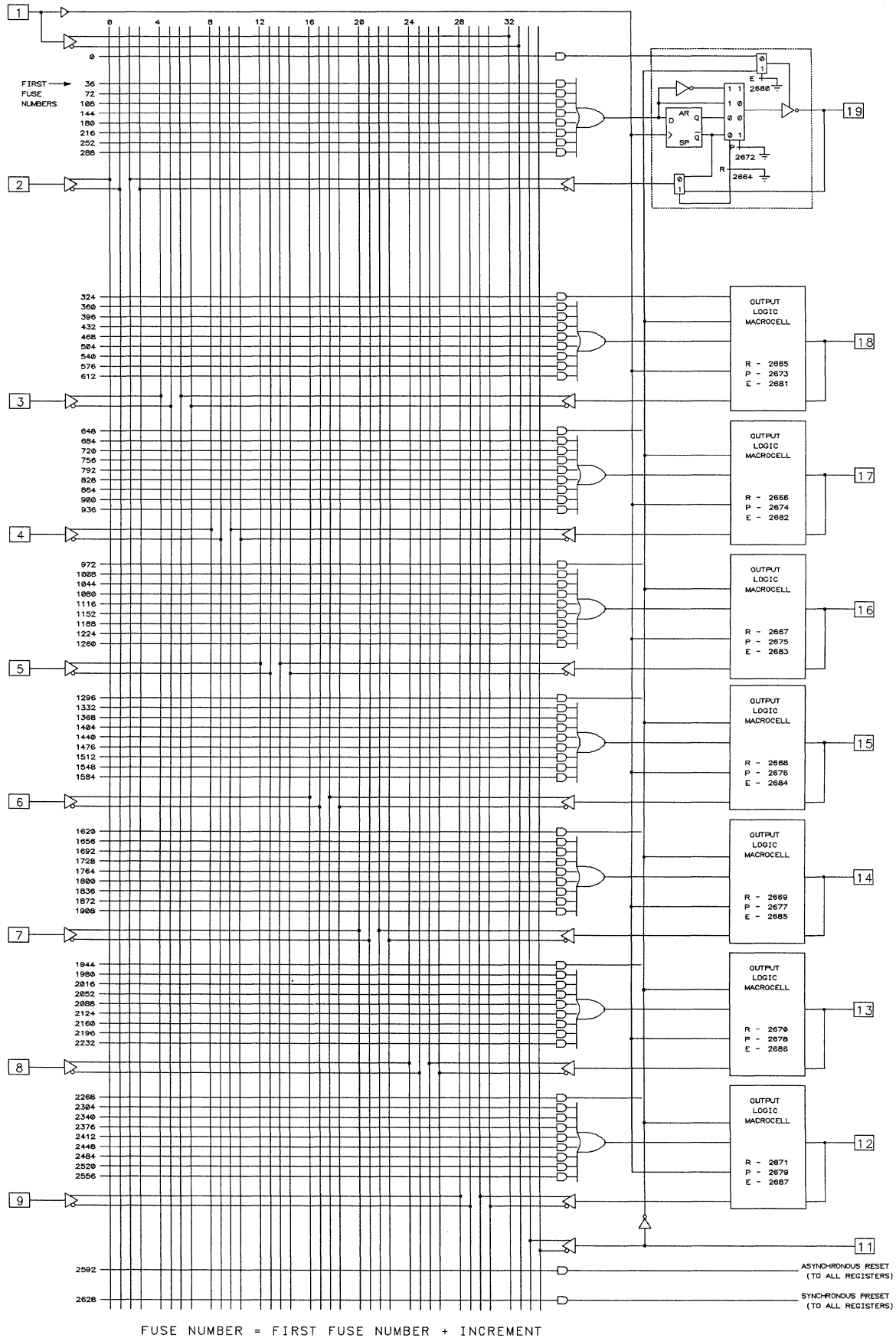


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

Data I/O Corporation



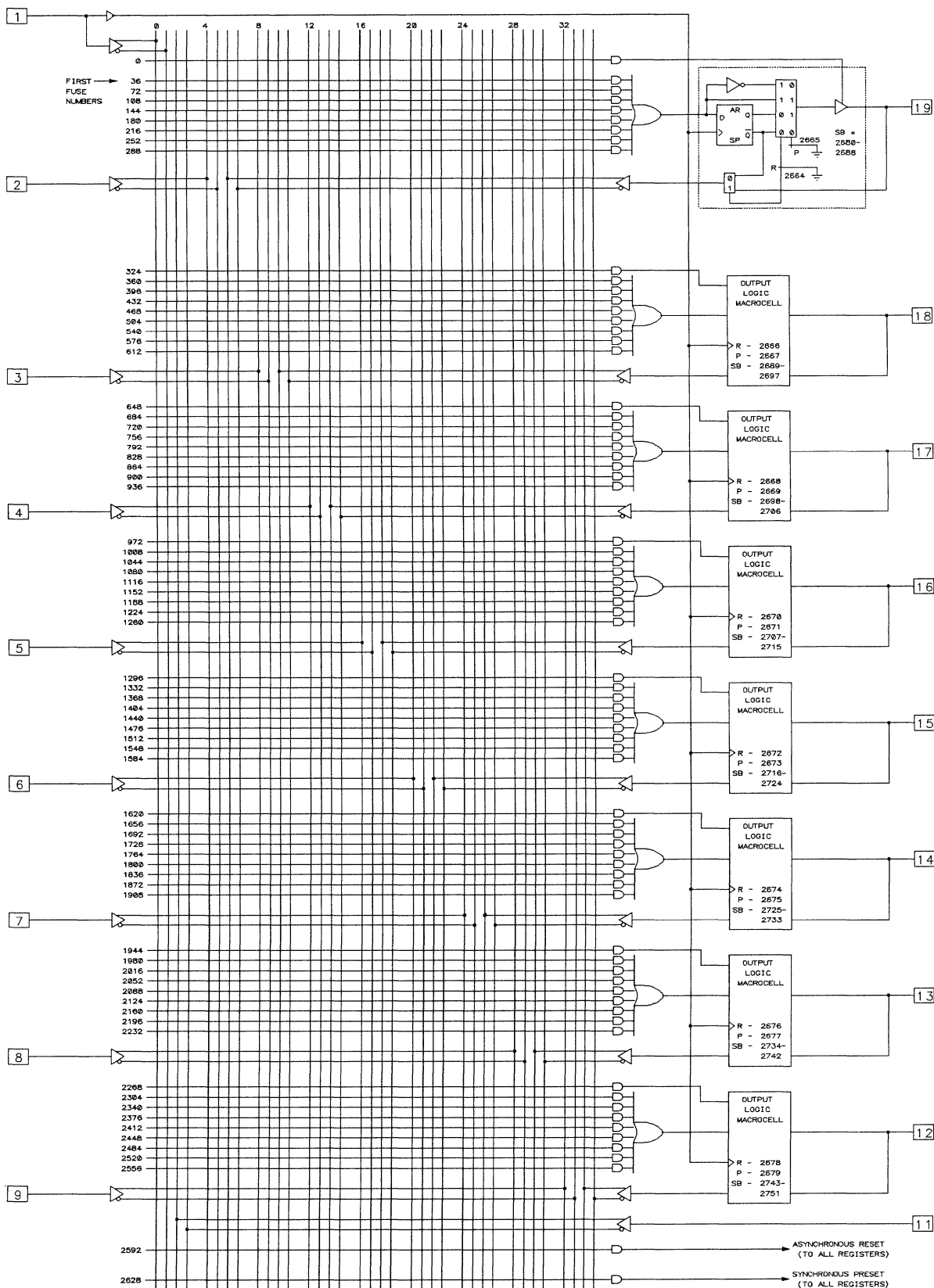
NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT



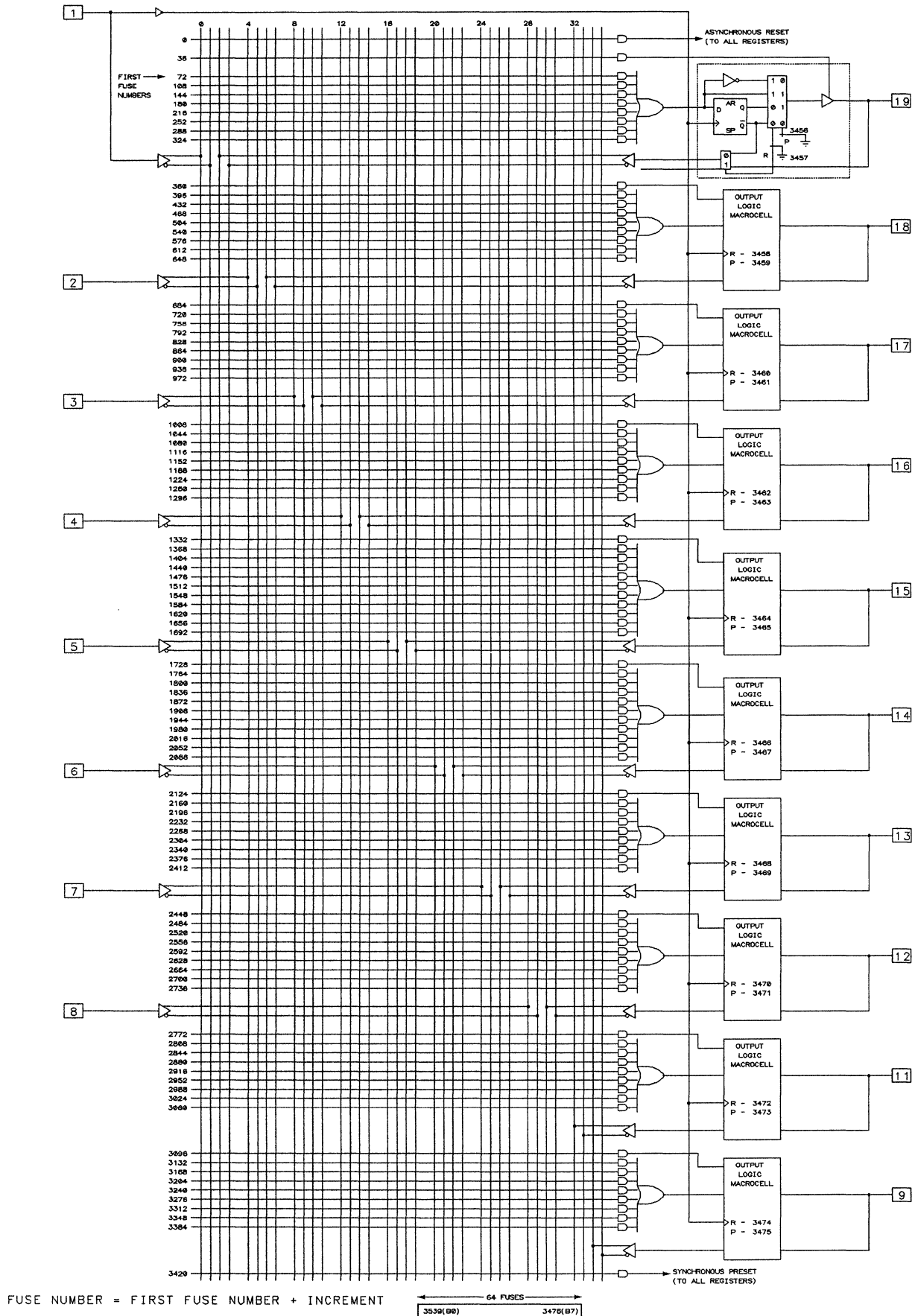
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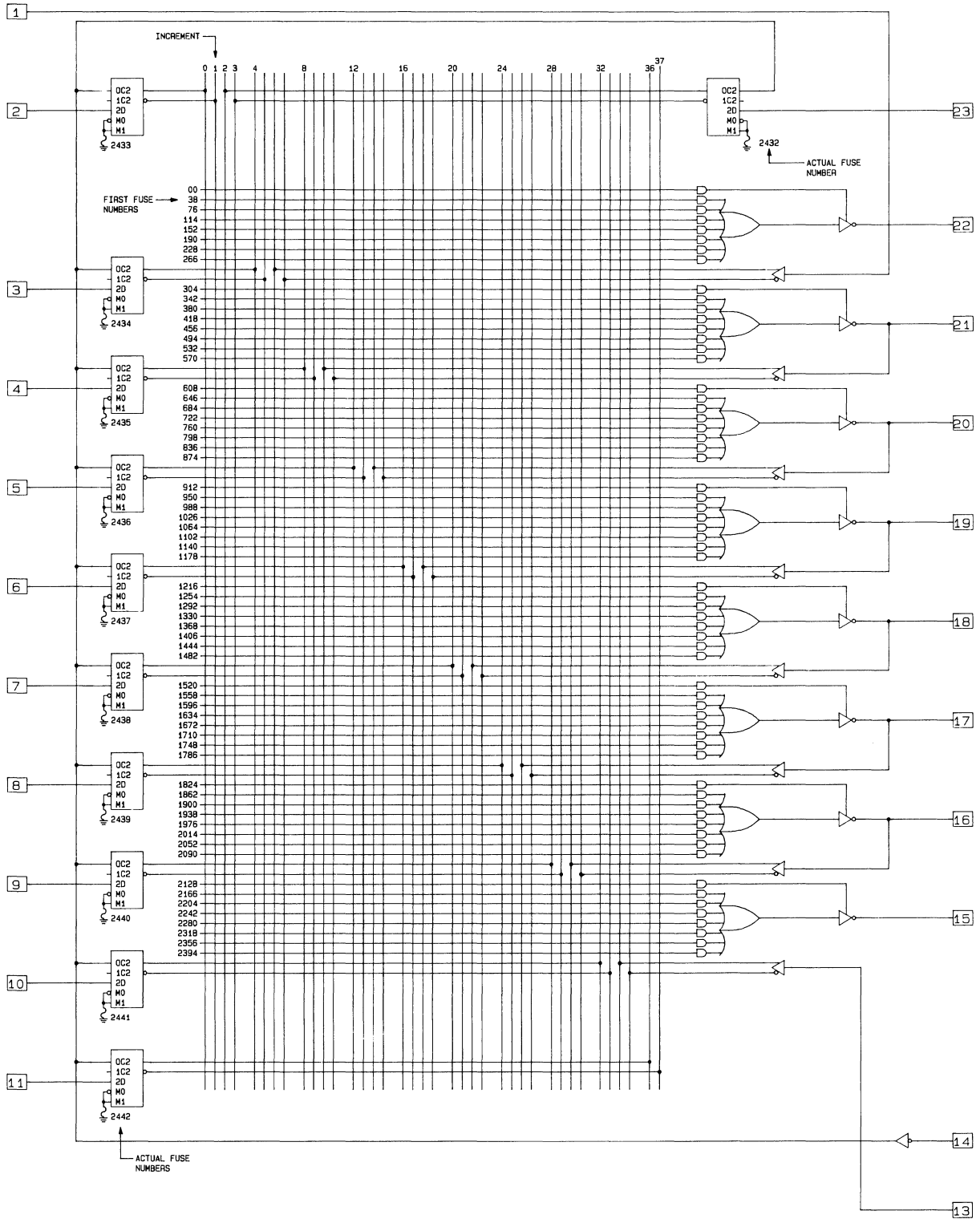
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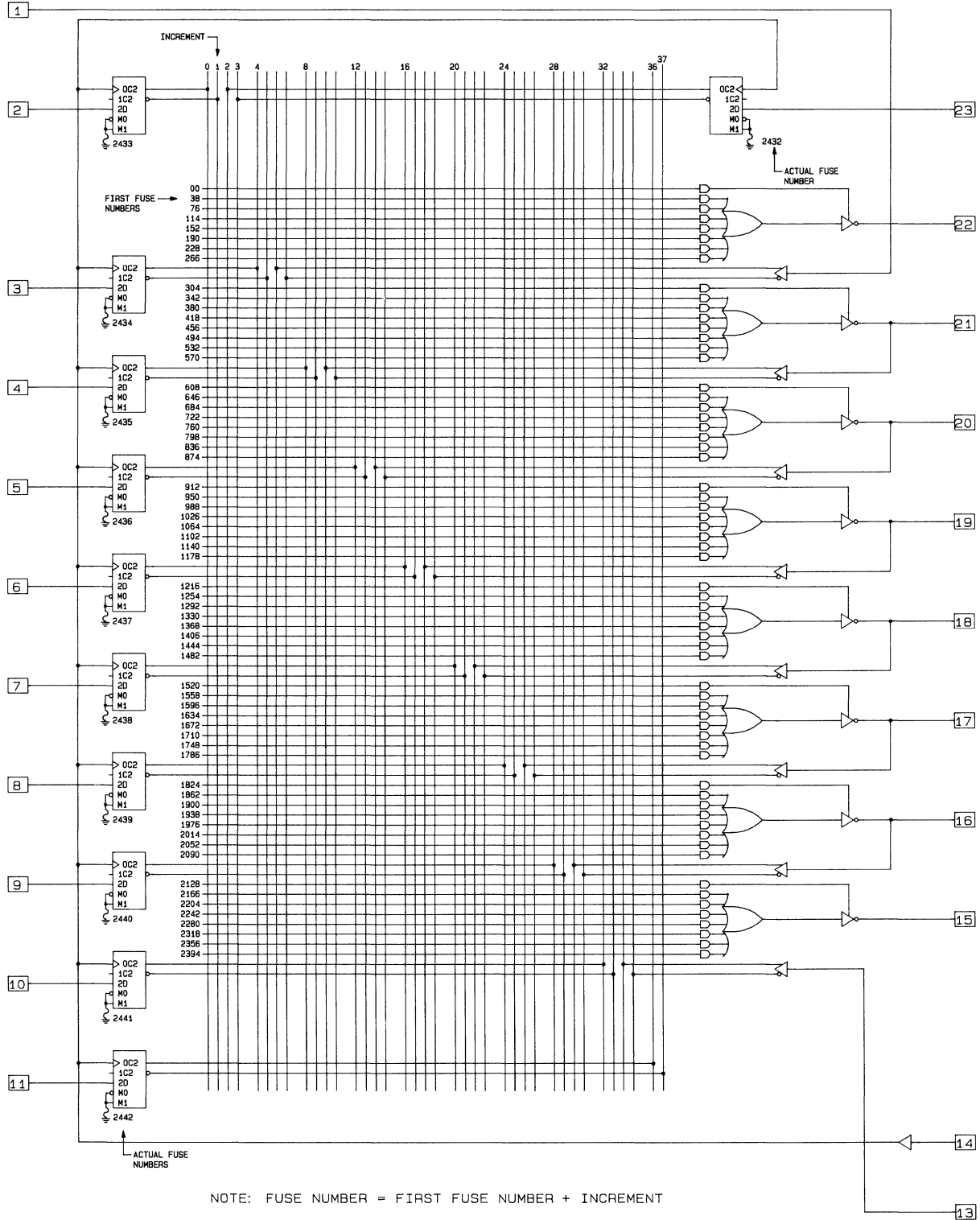


FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

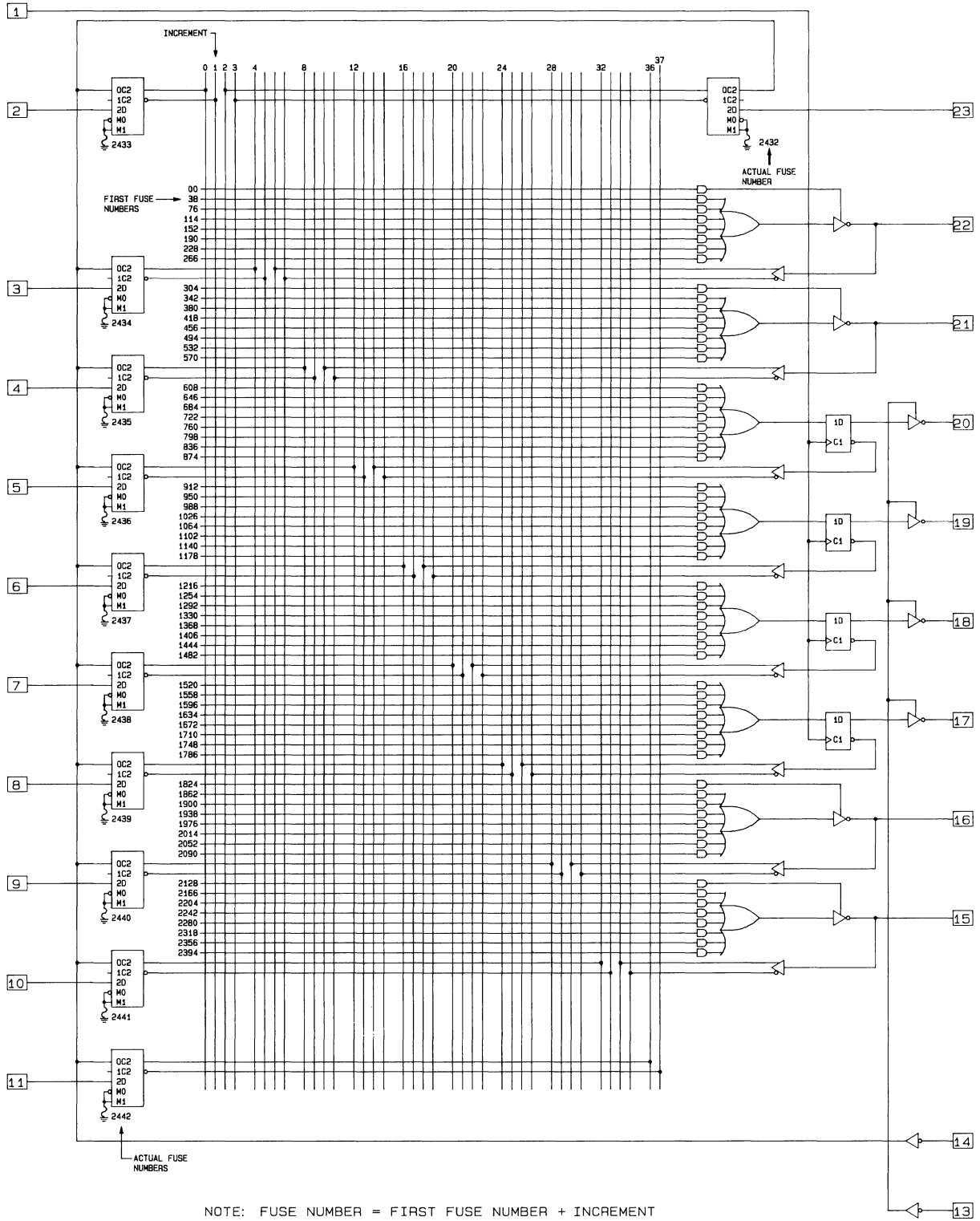


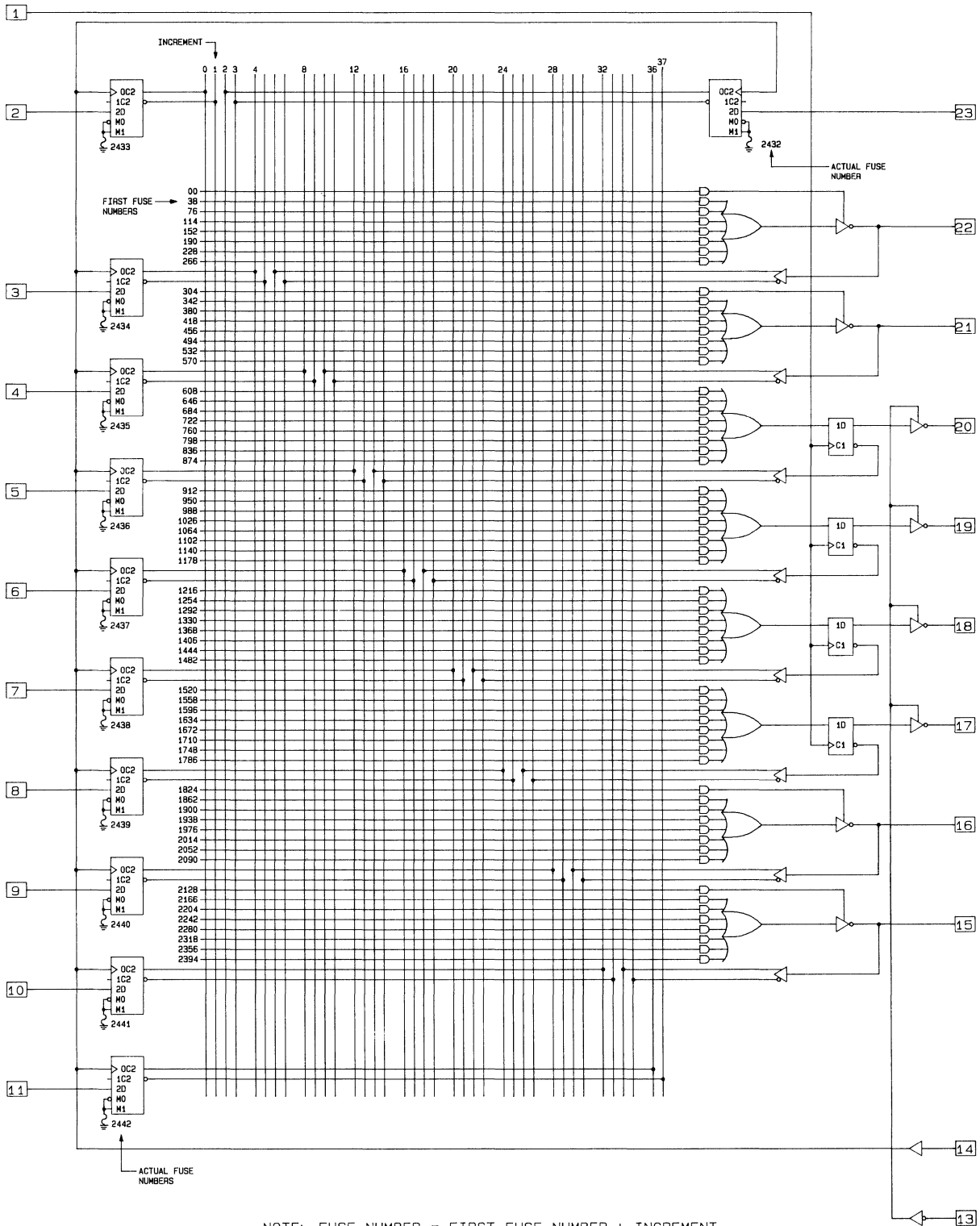
Corporation  
Data I/O



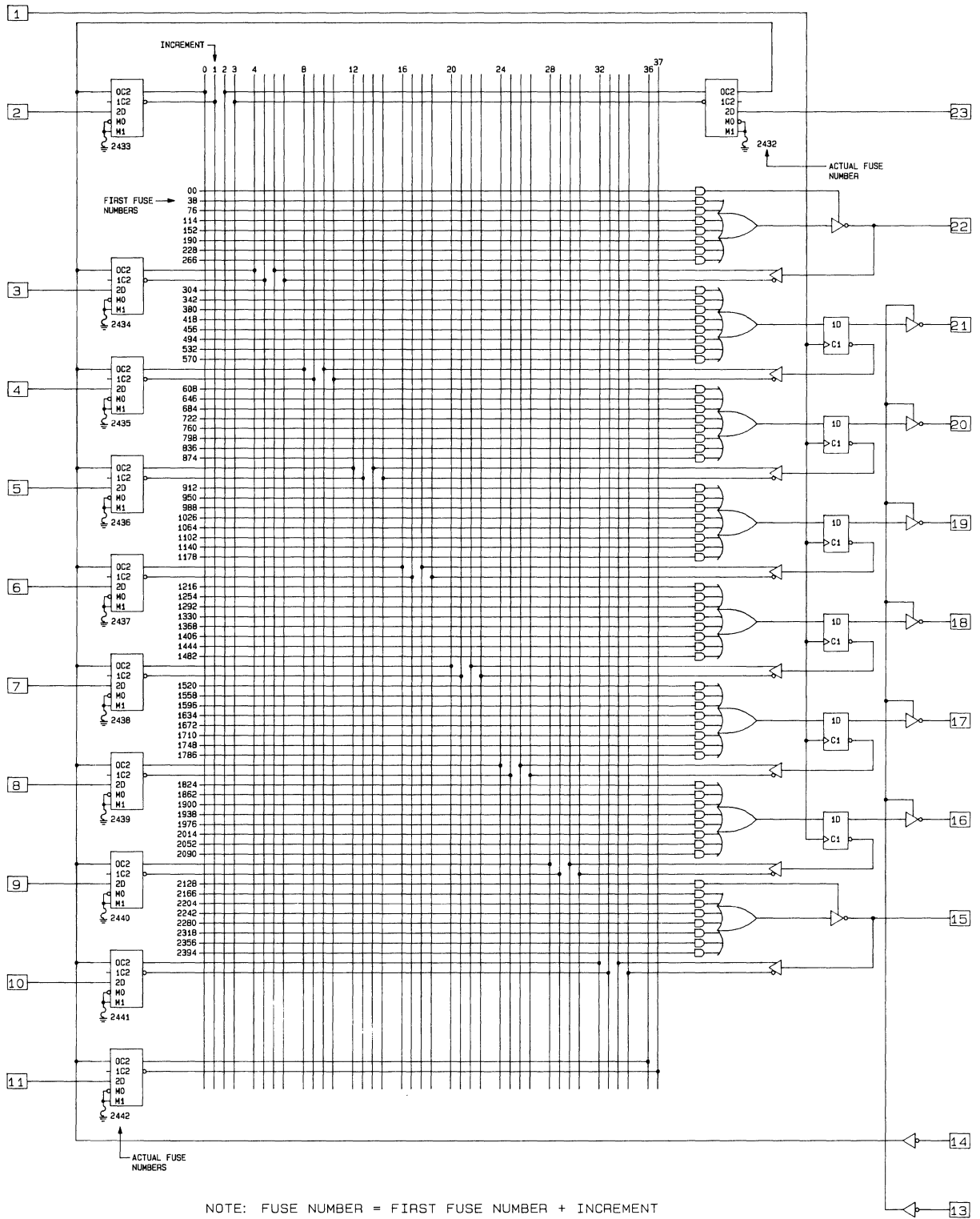


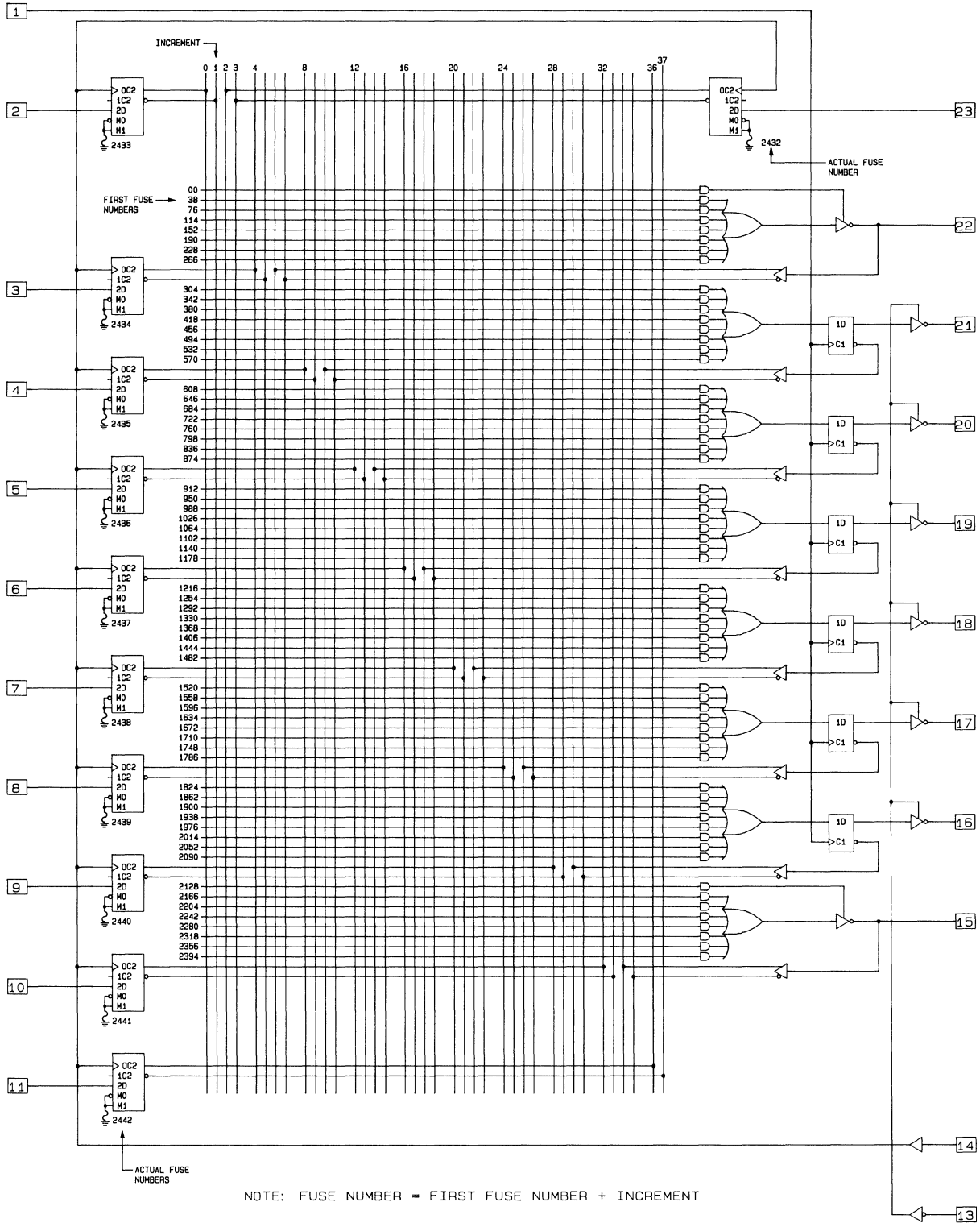
Data I/O Corporation





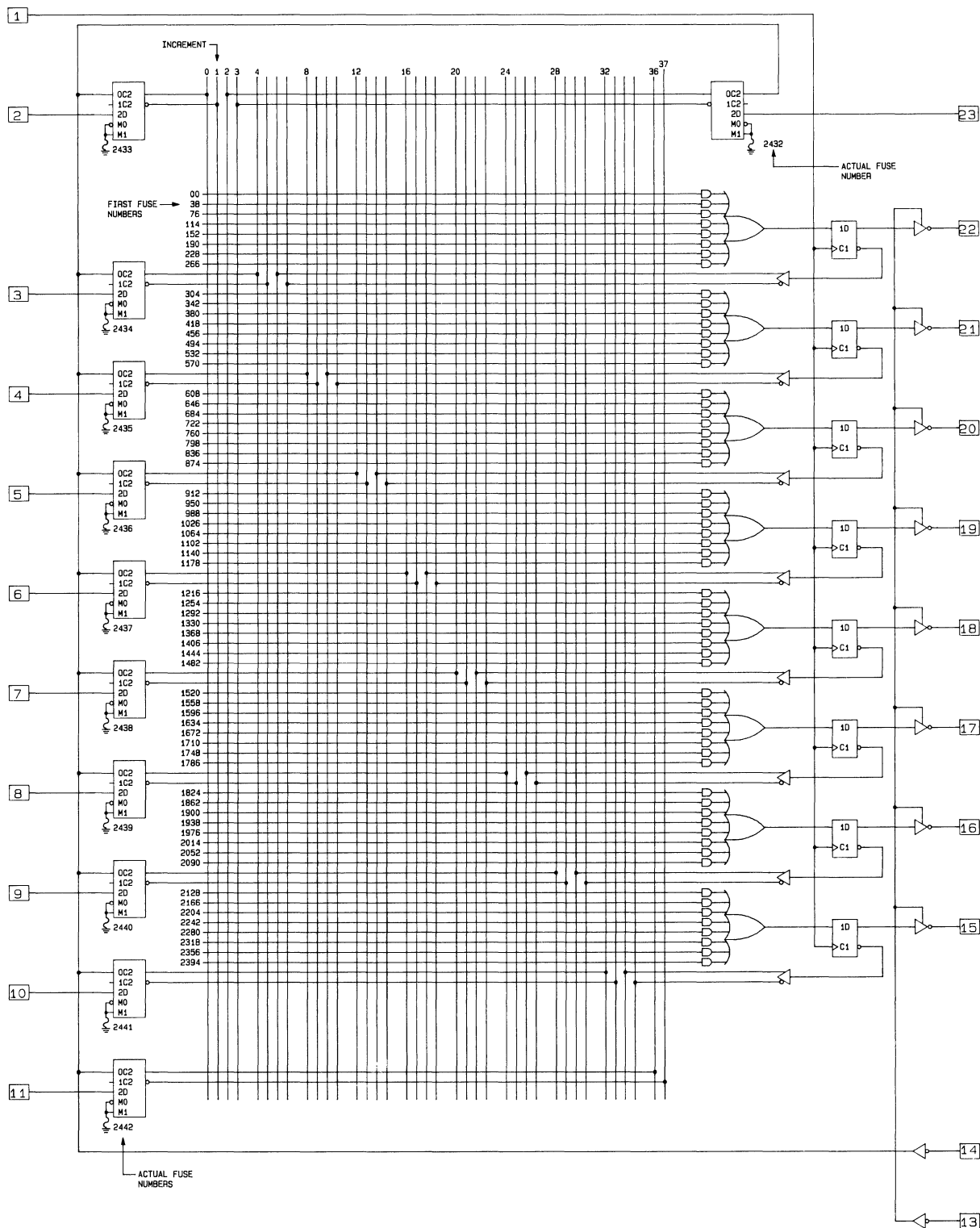
Data I/O Corporation



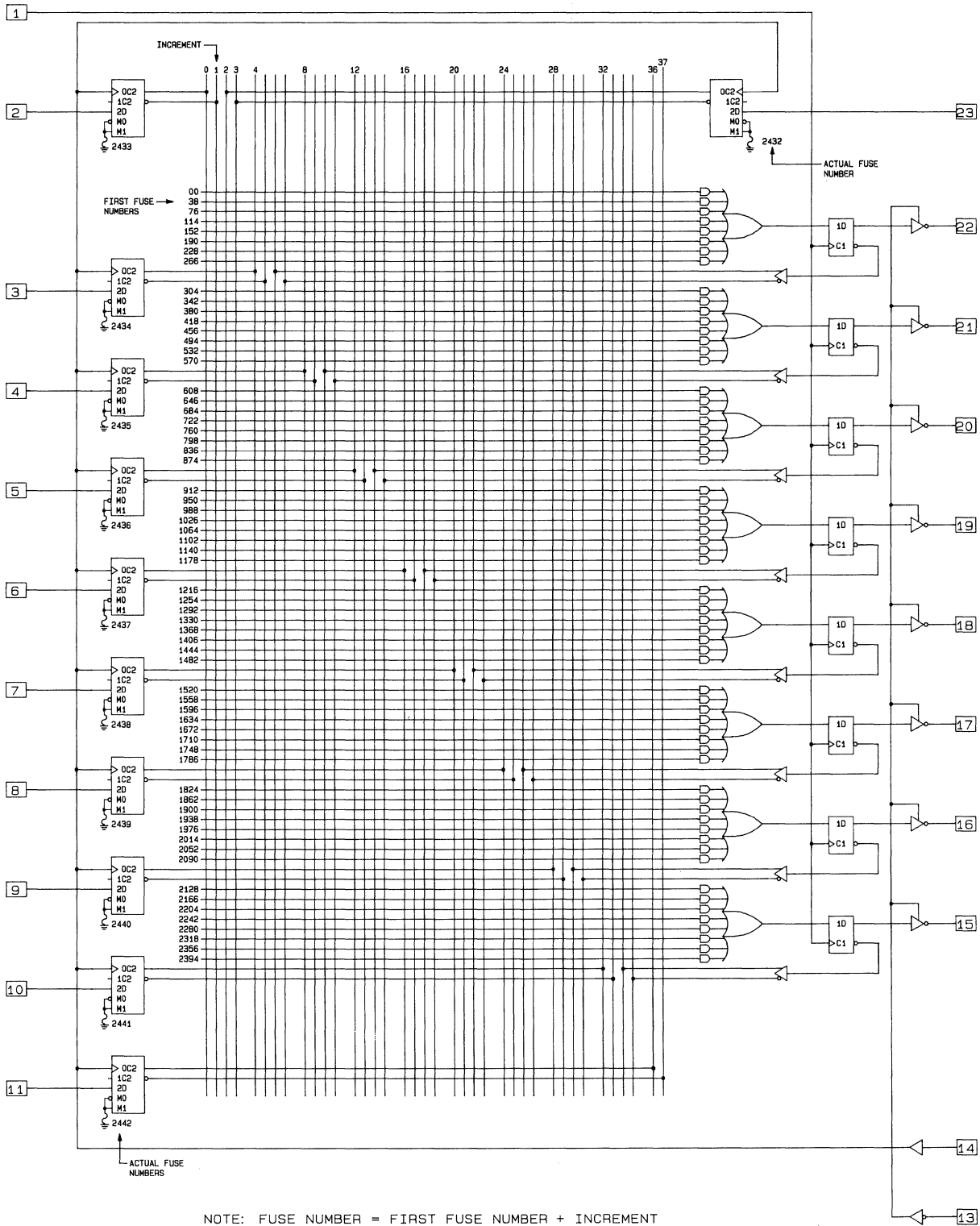




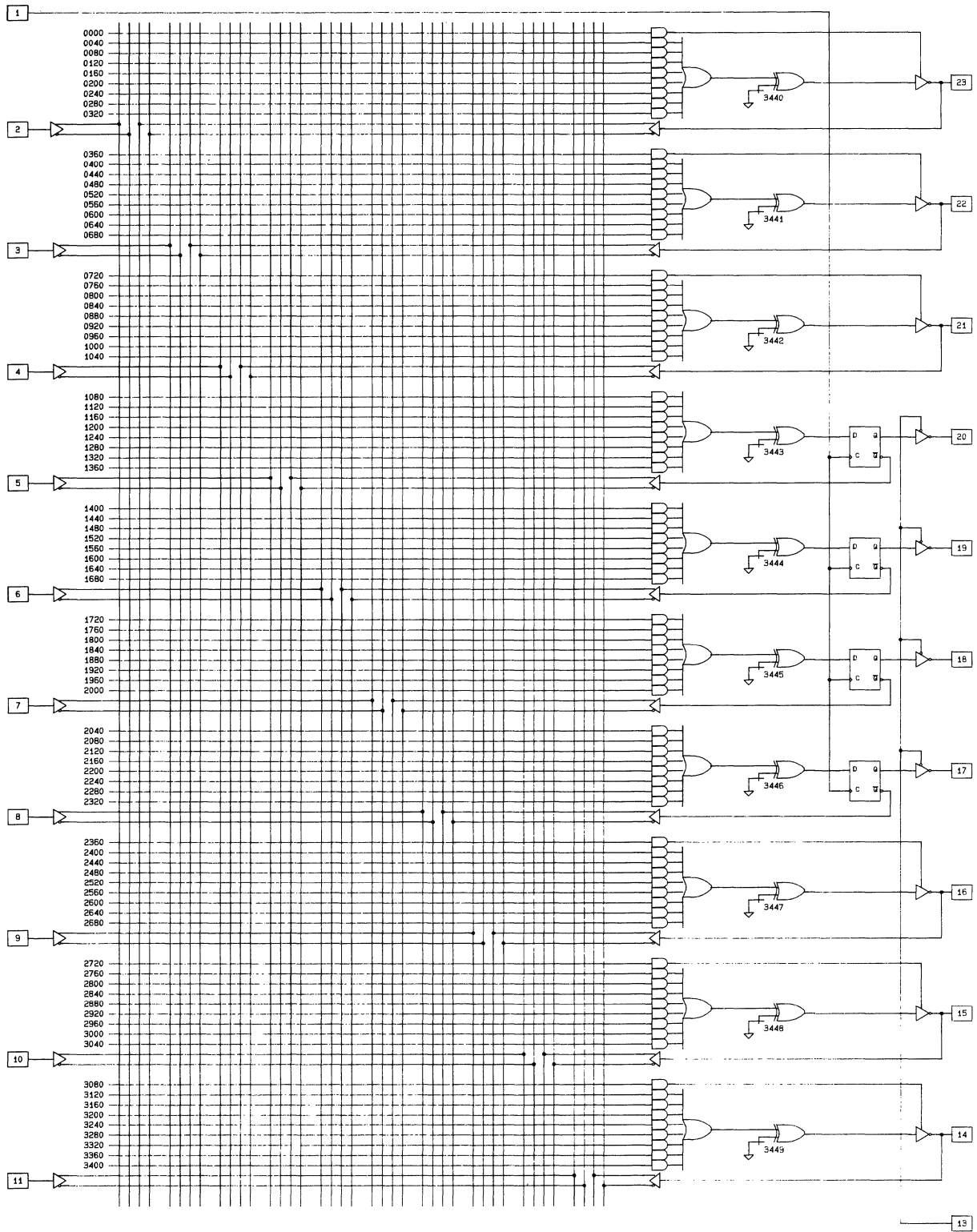
Data I/O Corporation

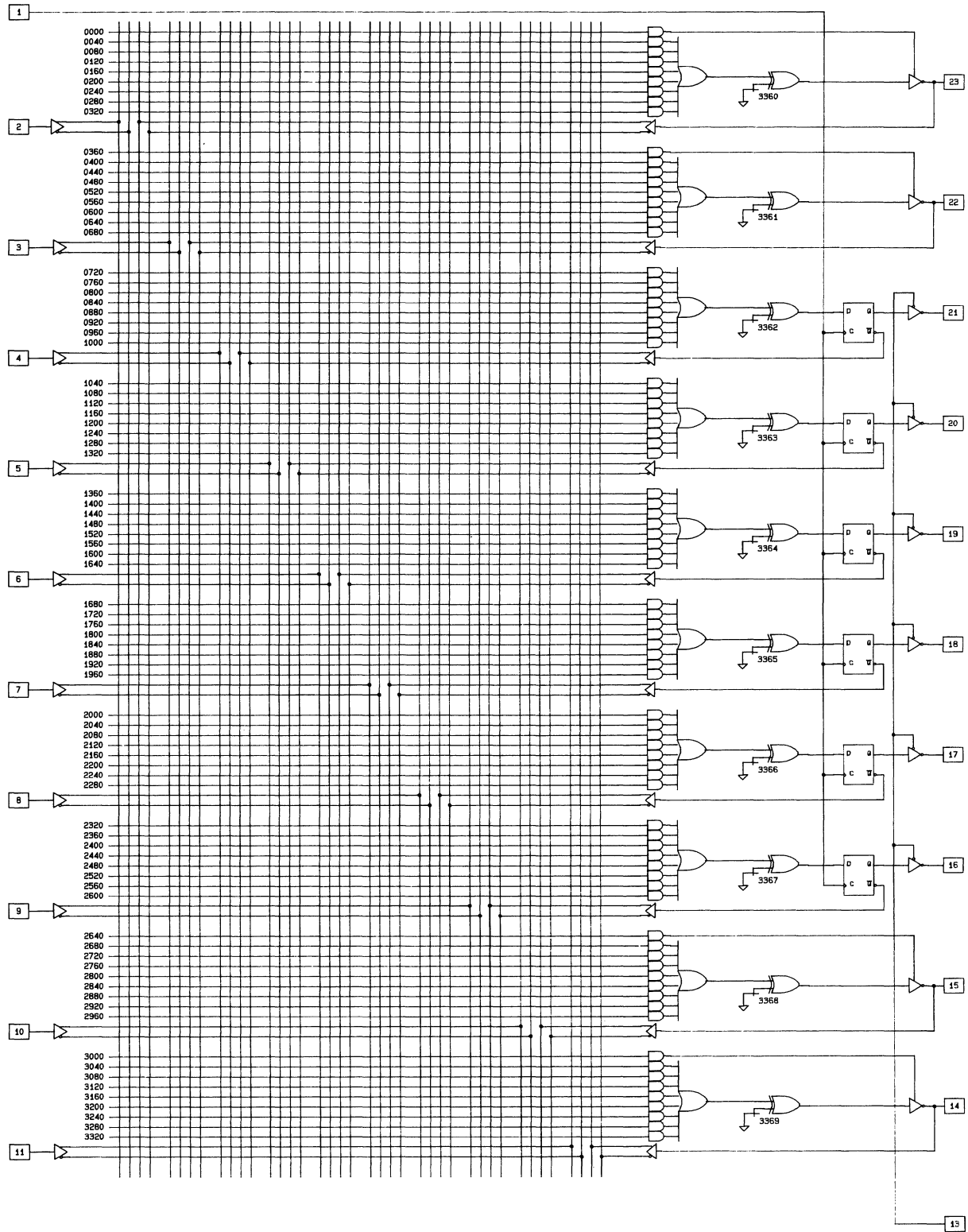


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

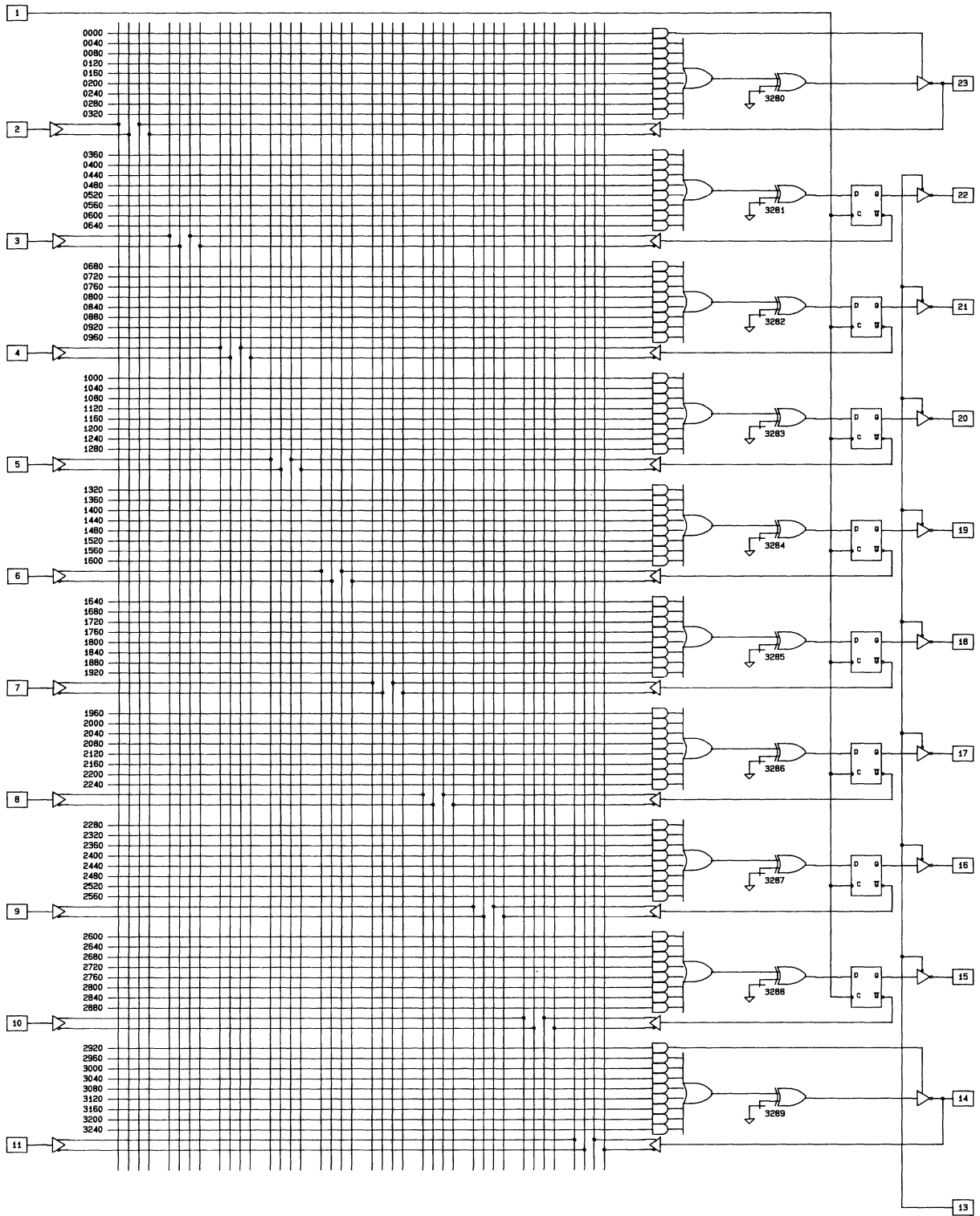


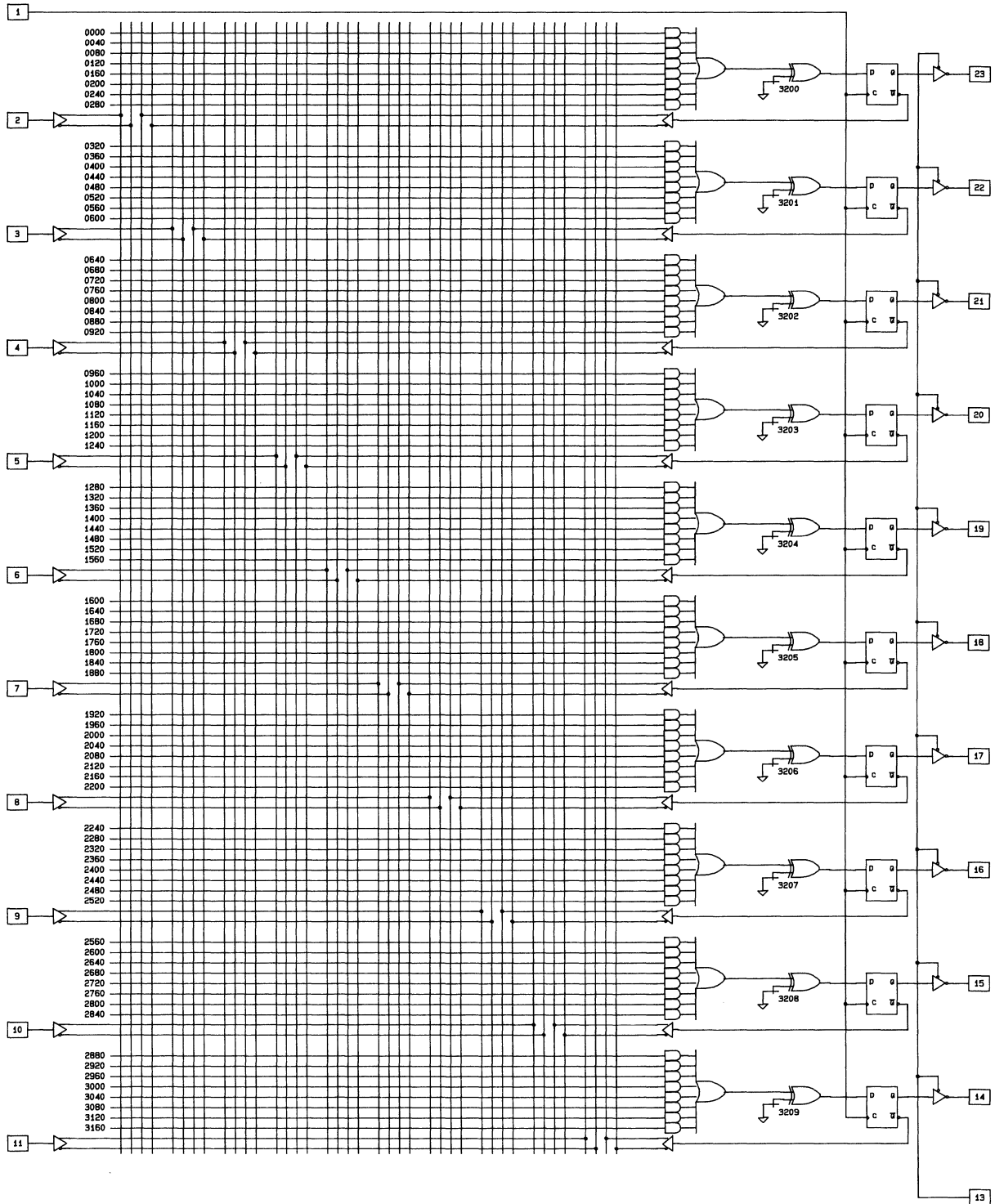
Corporation  
Data I/O



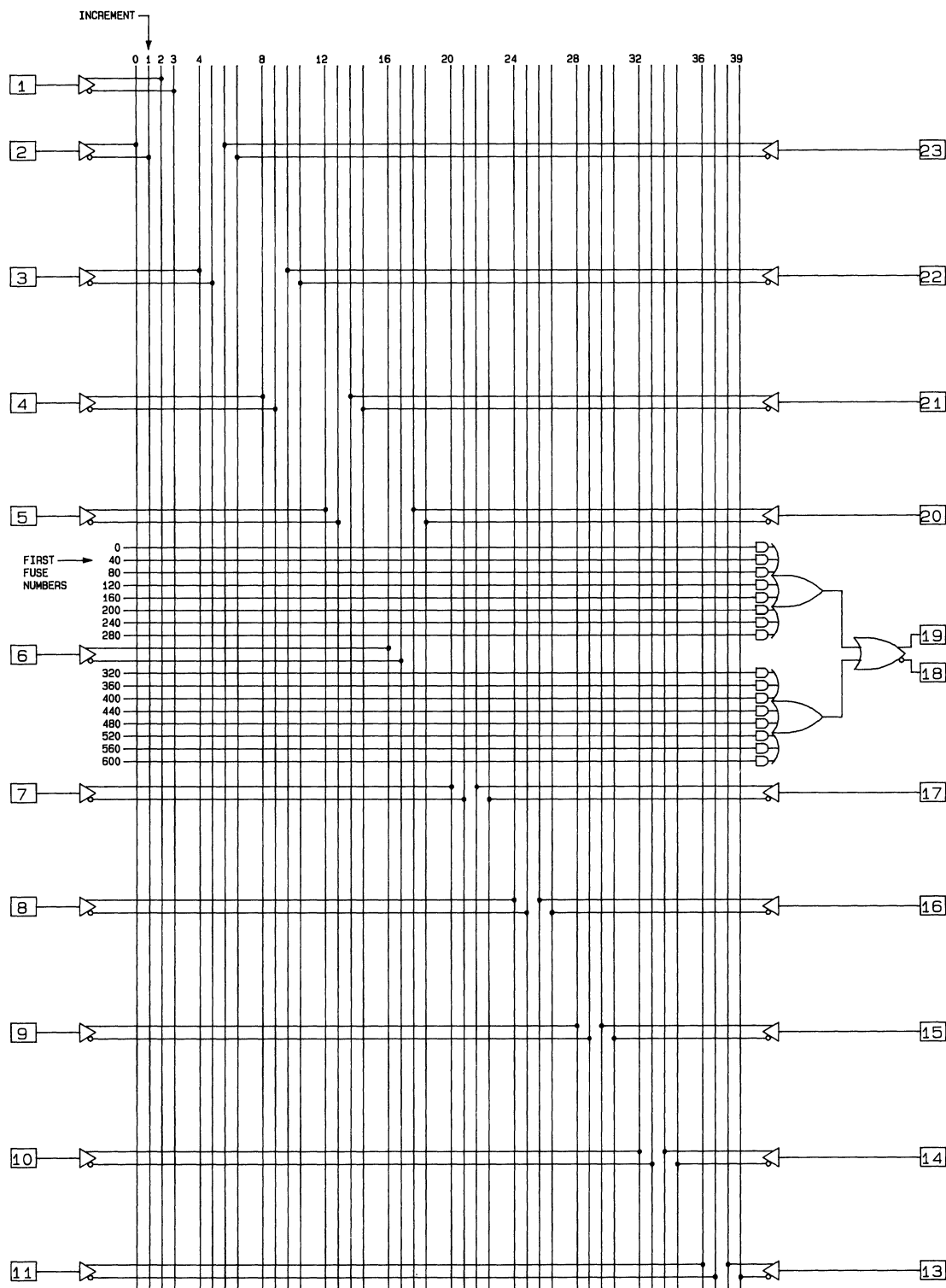


Corporation  
Data I/O

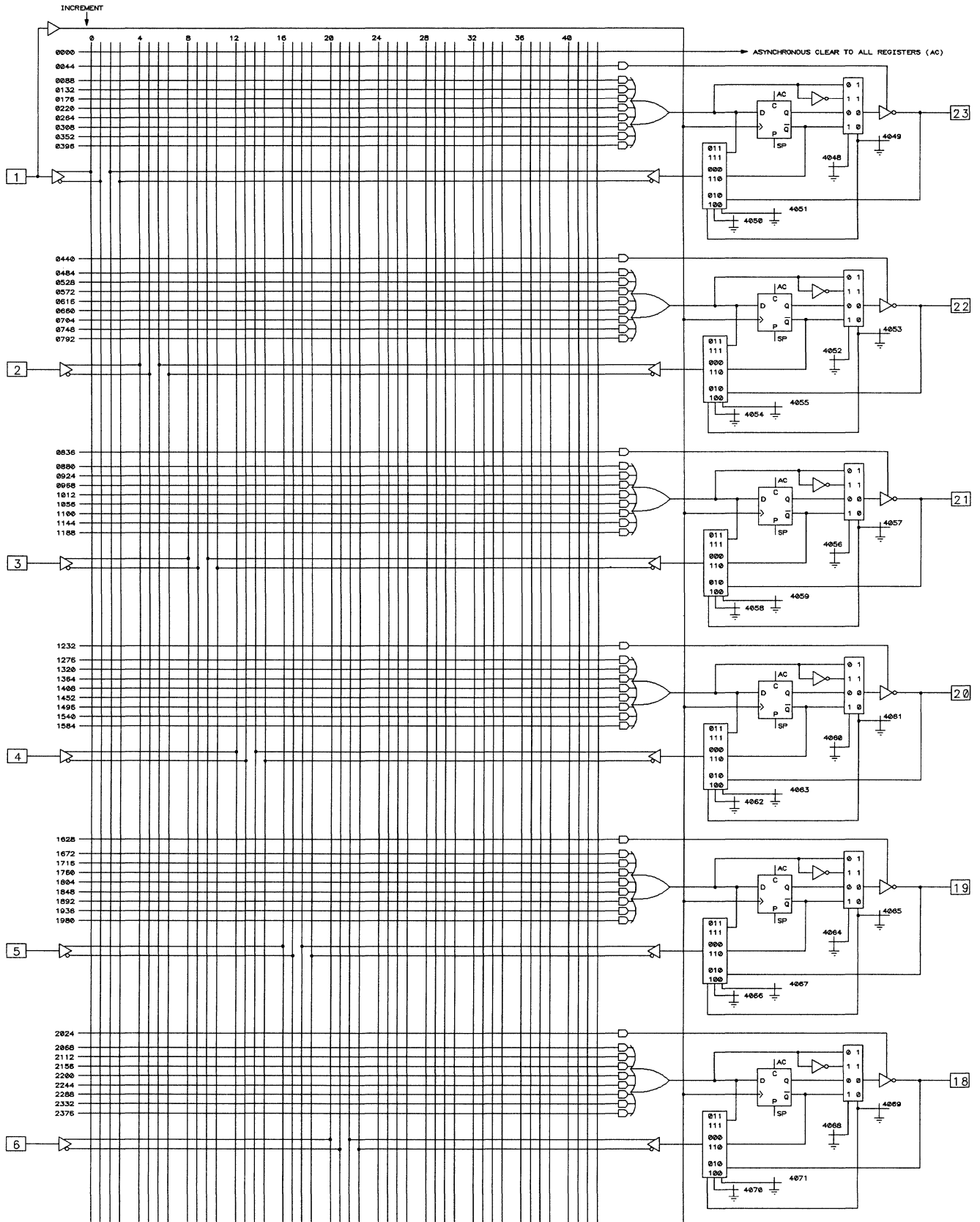




Data I/O Corporation

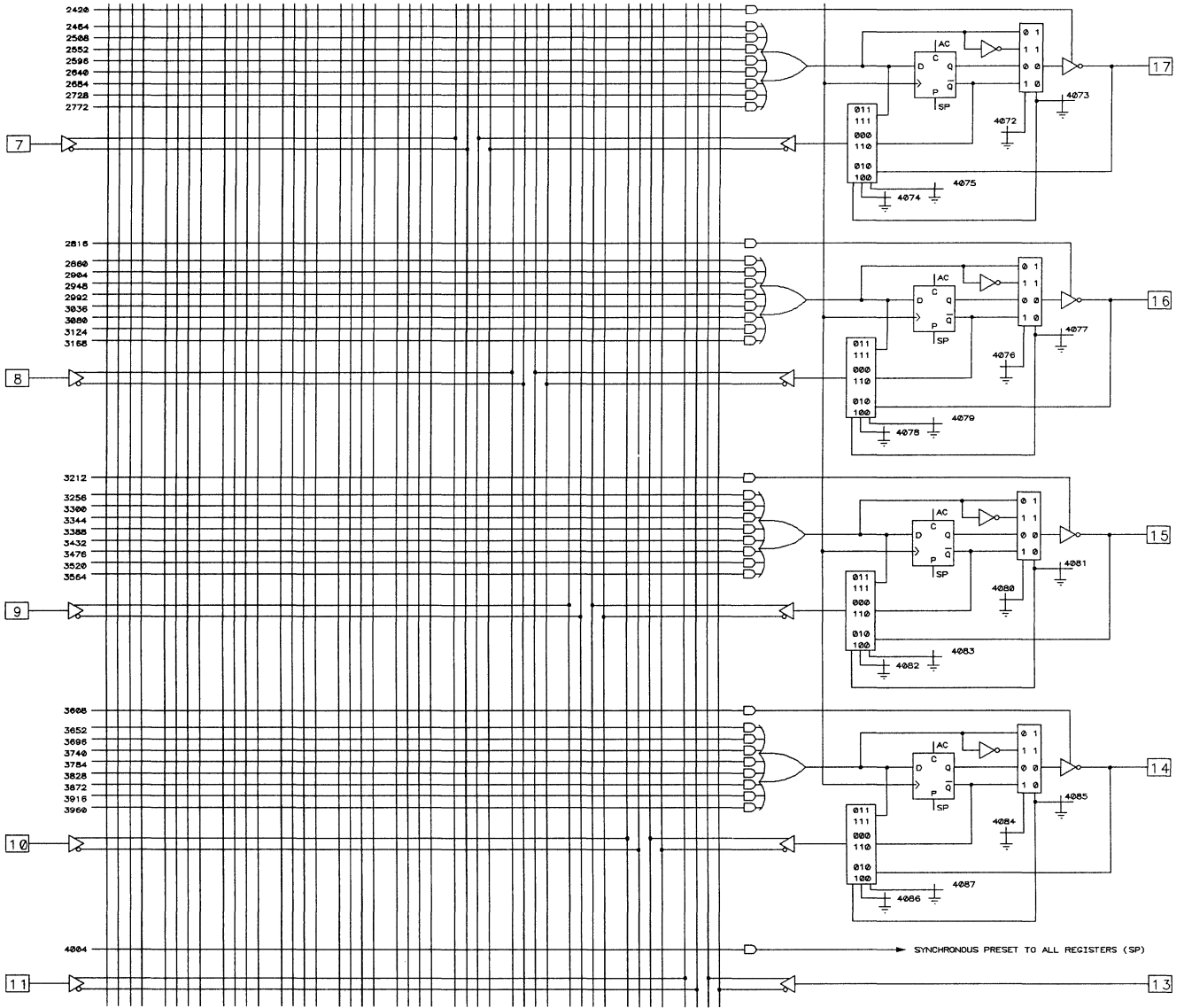


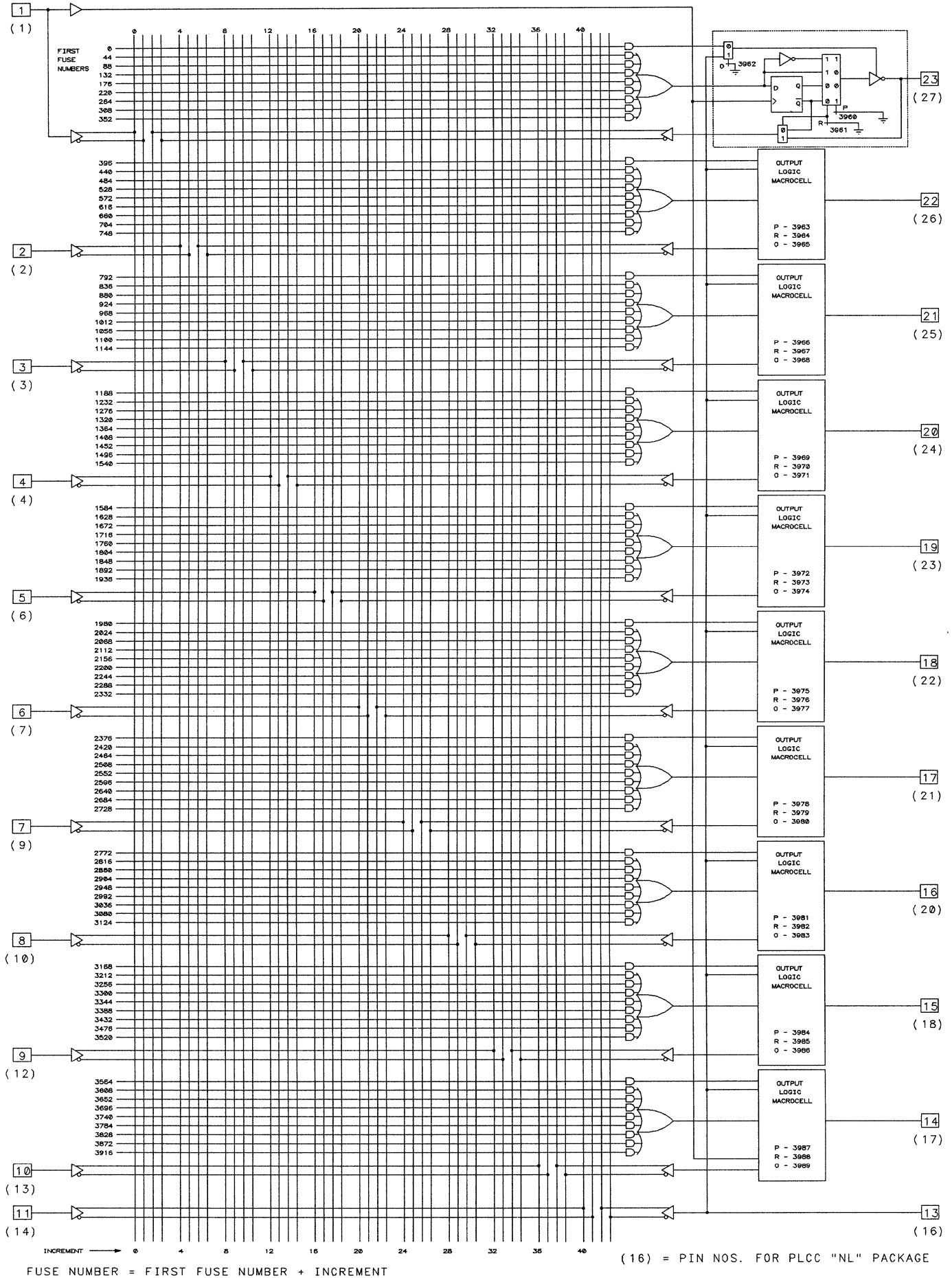
NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT



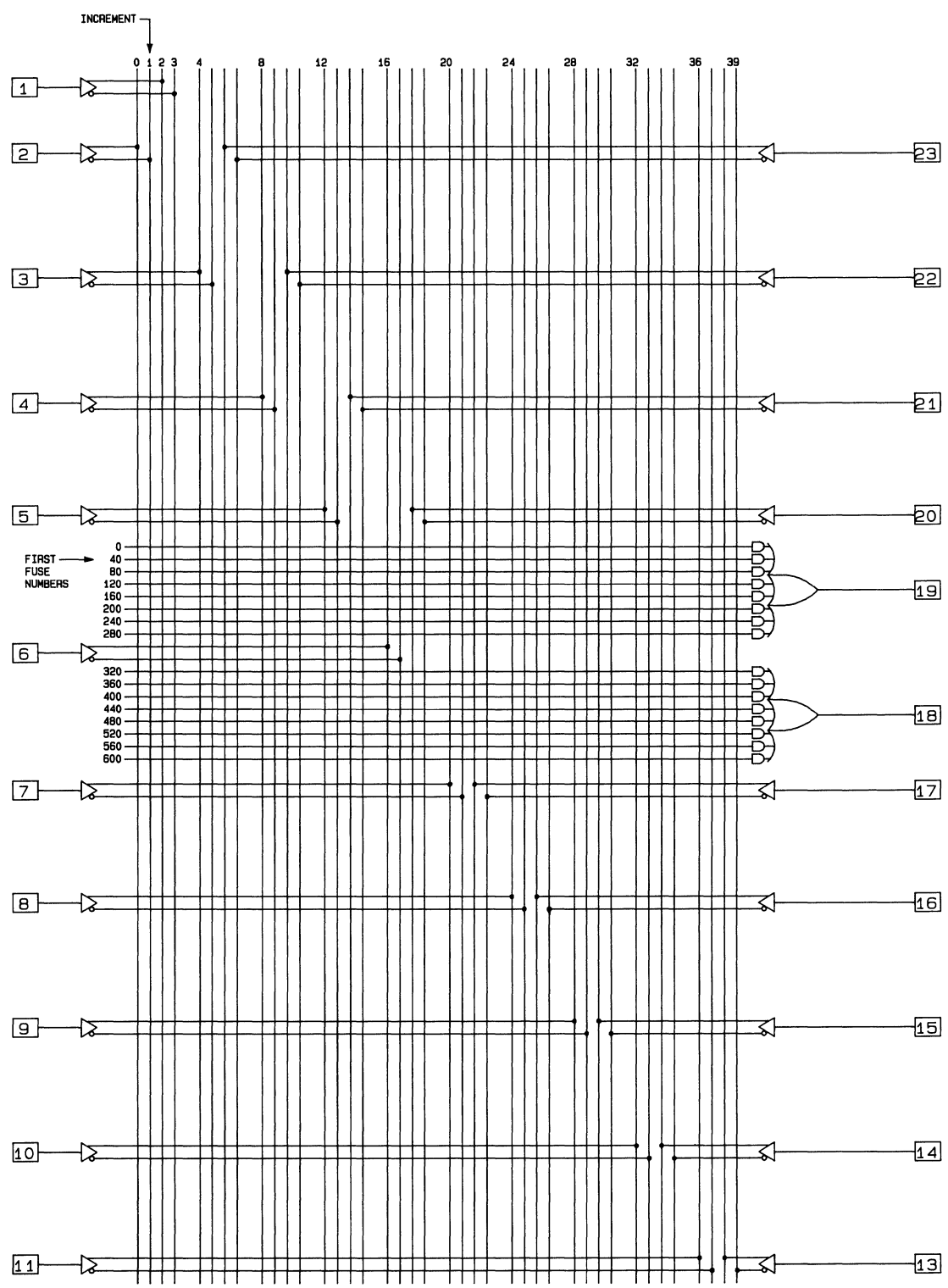


Data I/O Corporation

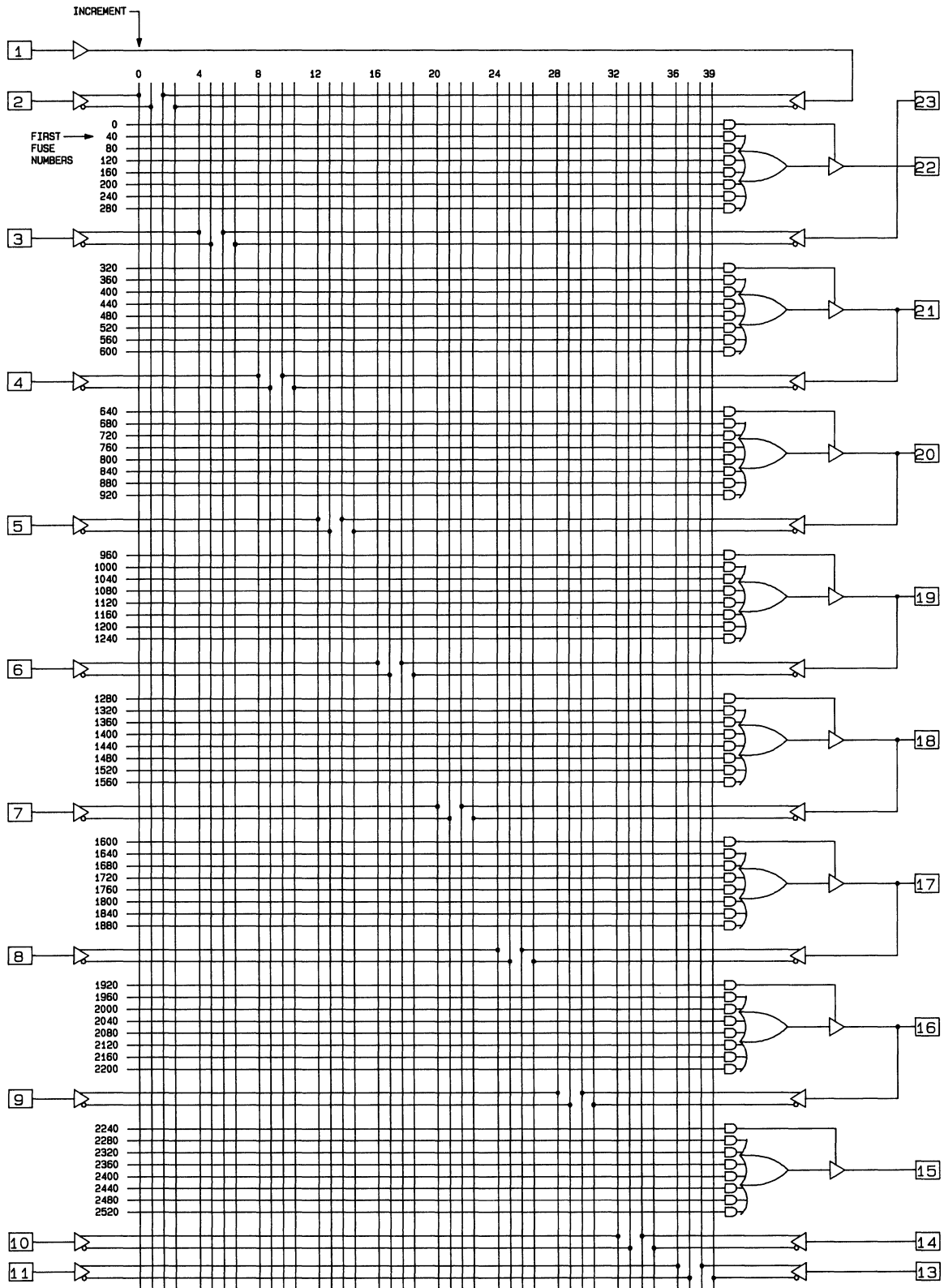




Data I/O Corporation

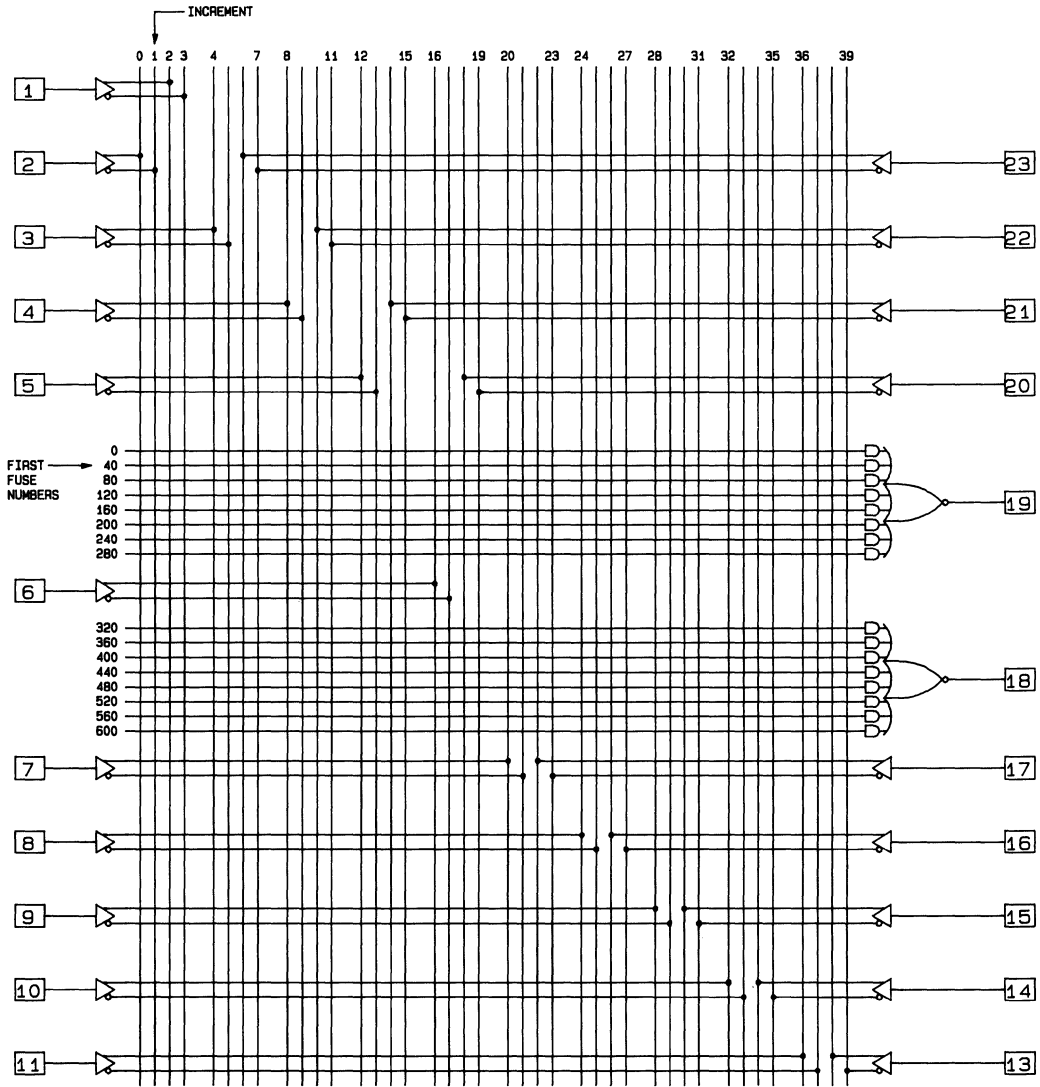


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

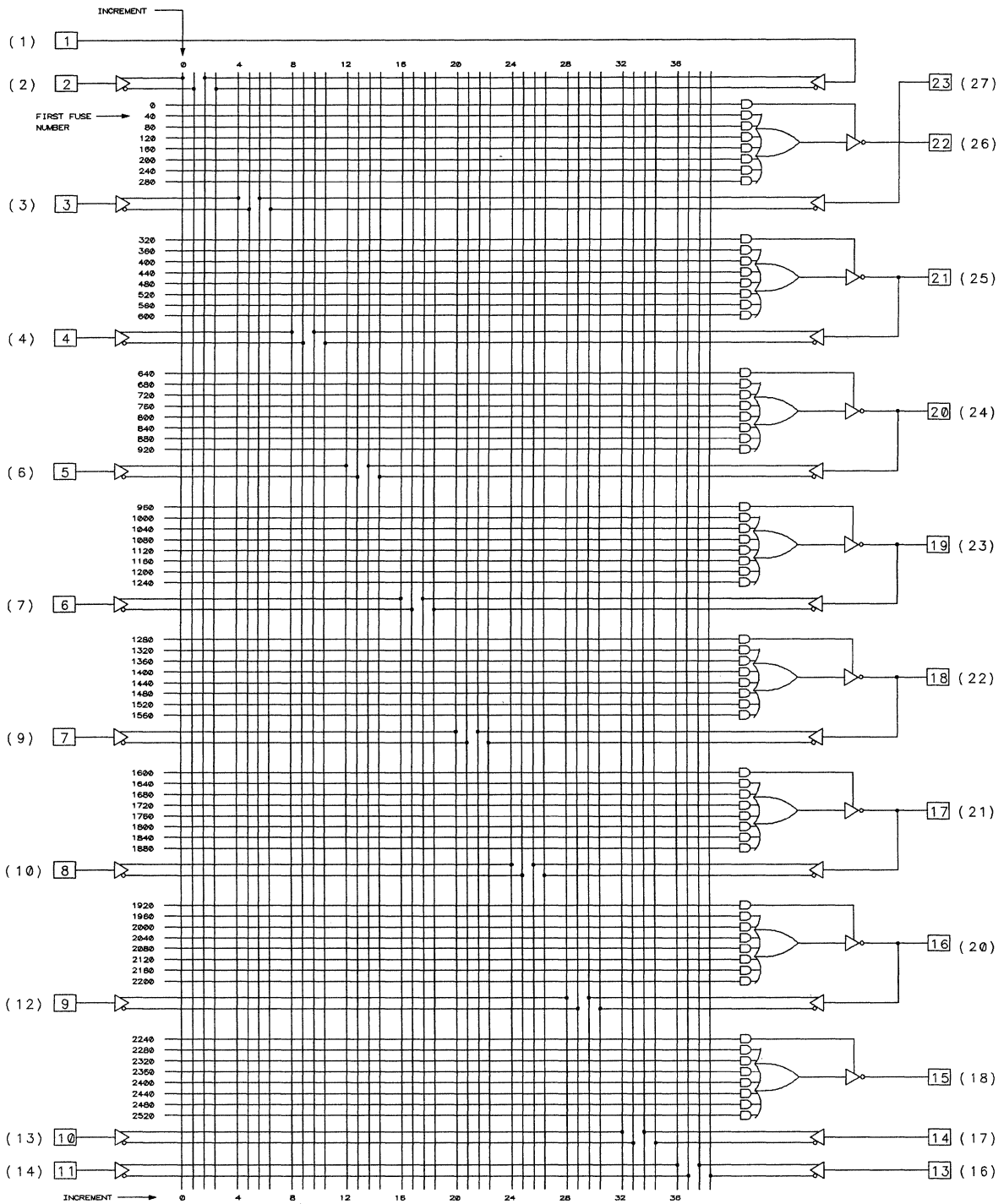


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

Data I/O Corporation

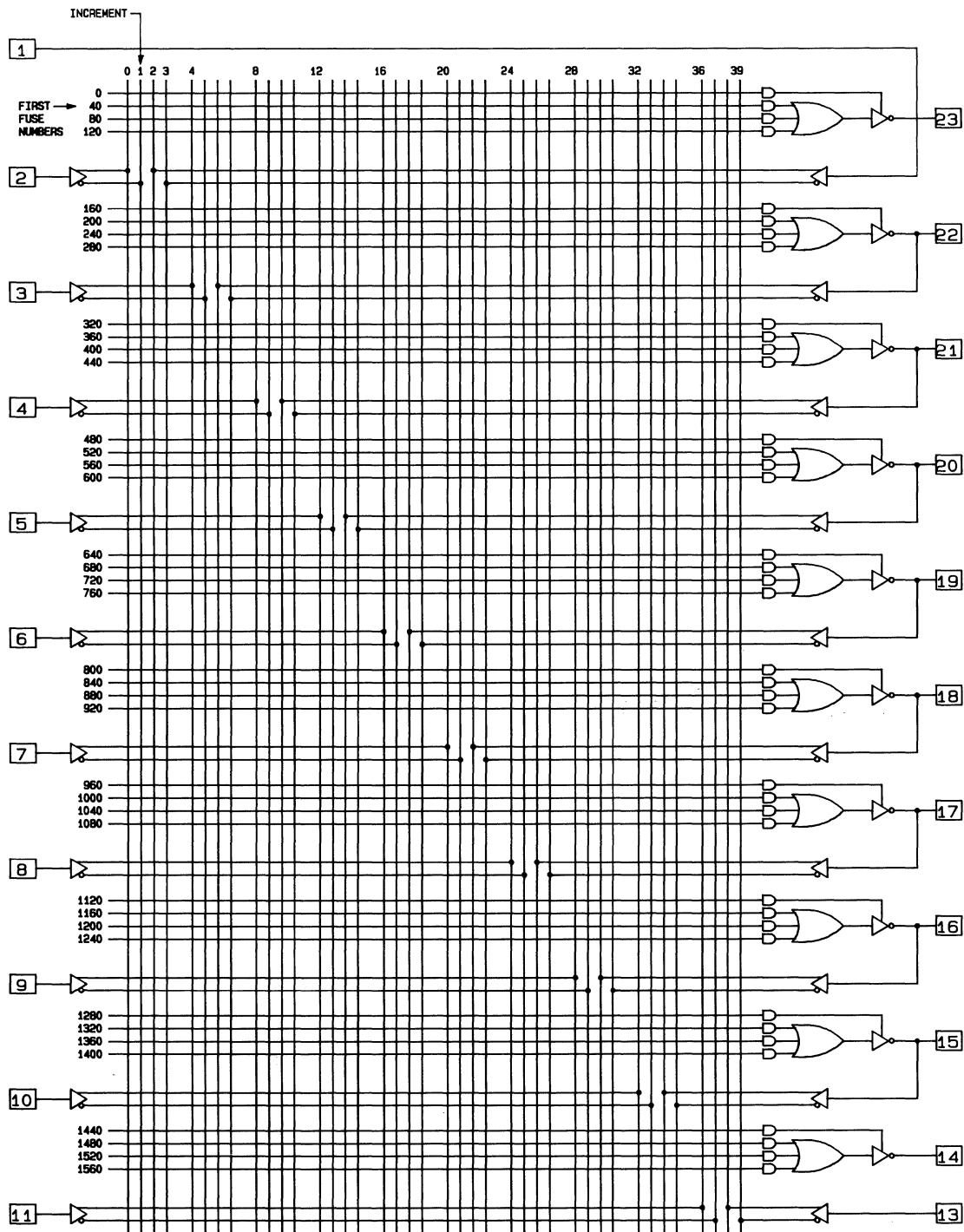


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

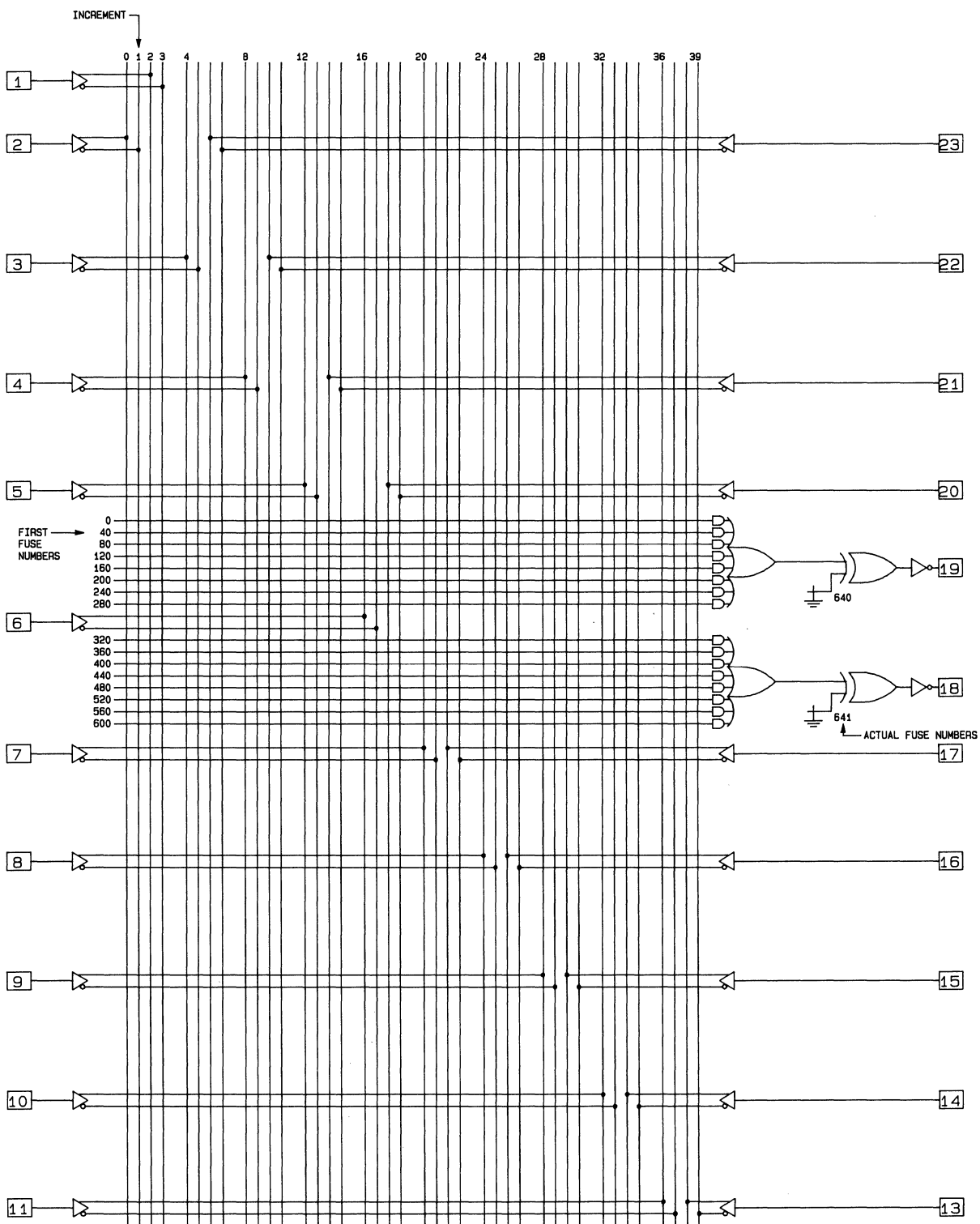


(16) = PIN NOS. FOR PLCC "NL" PACKAGE

Data I/O Corporation

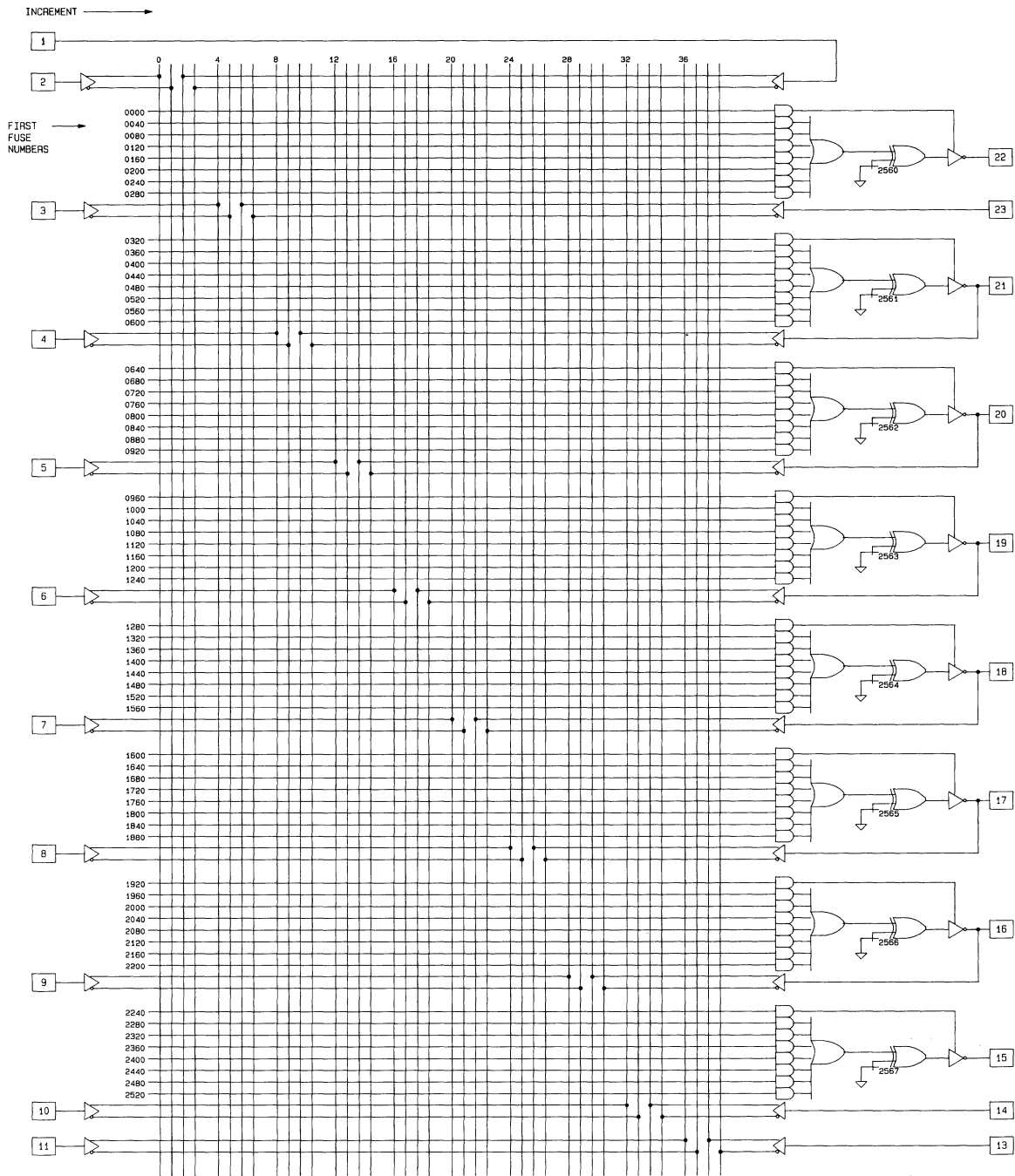


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

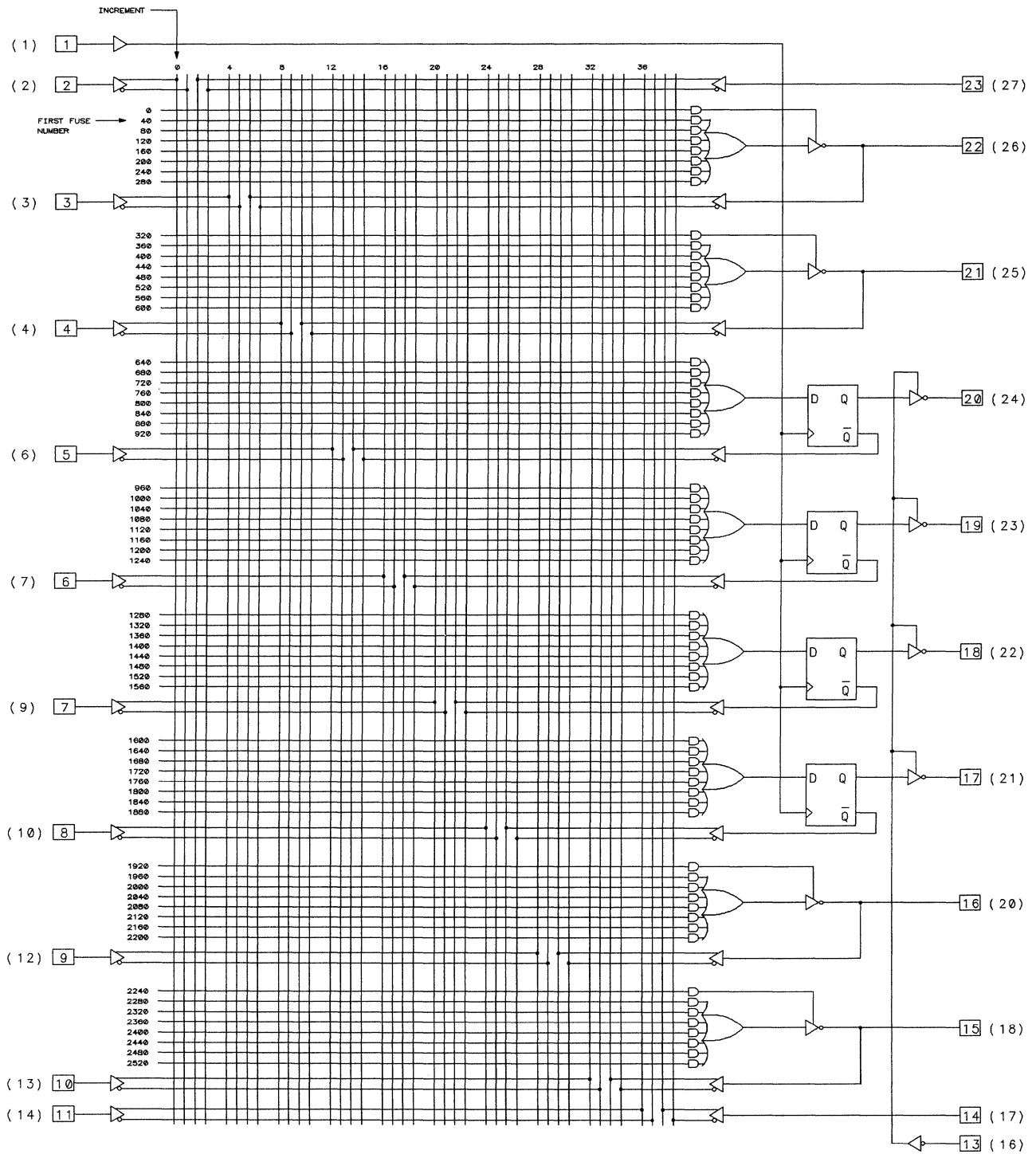


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT





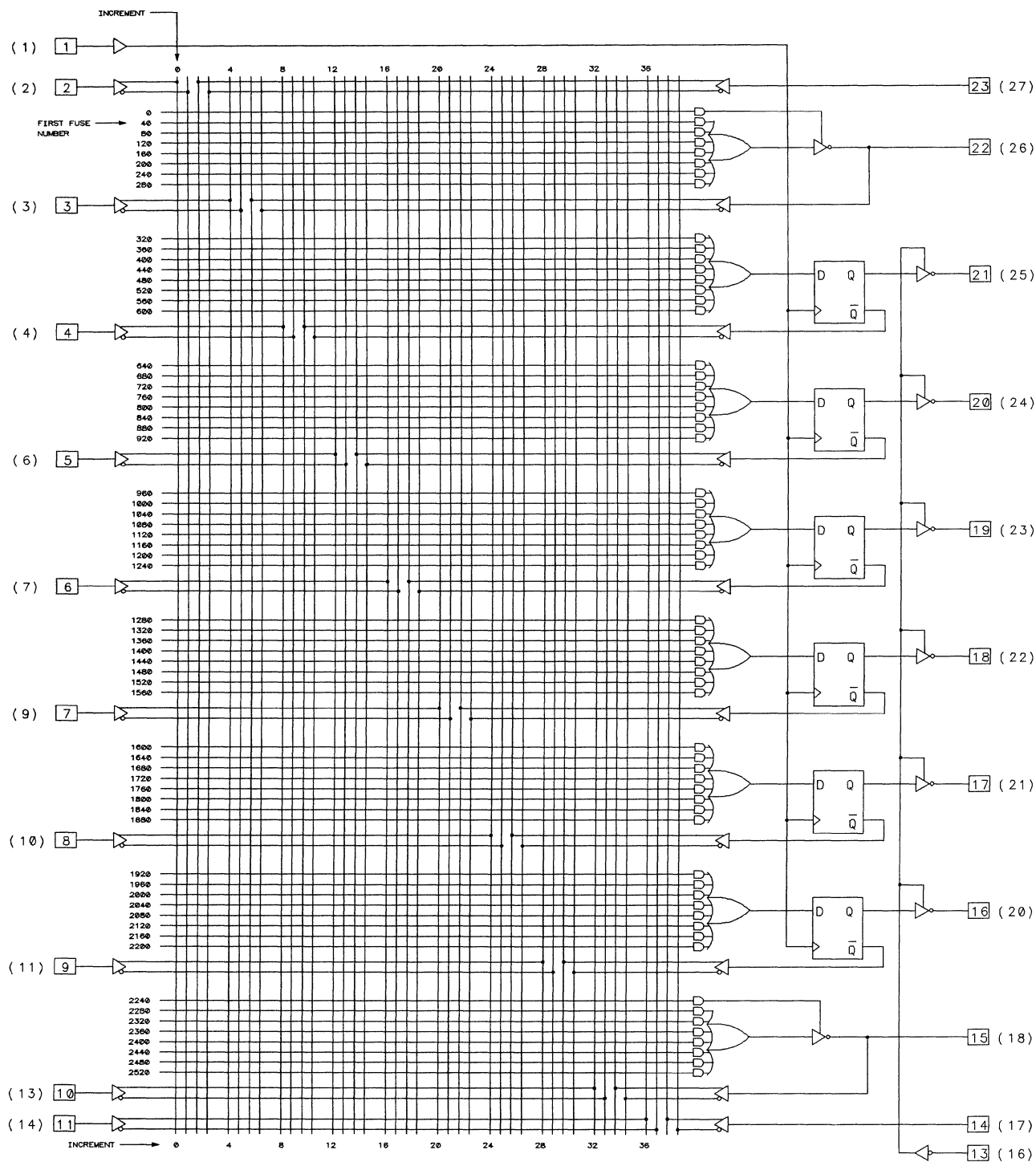
NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT



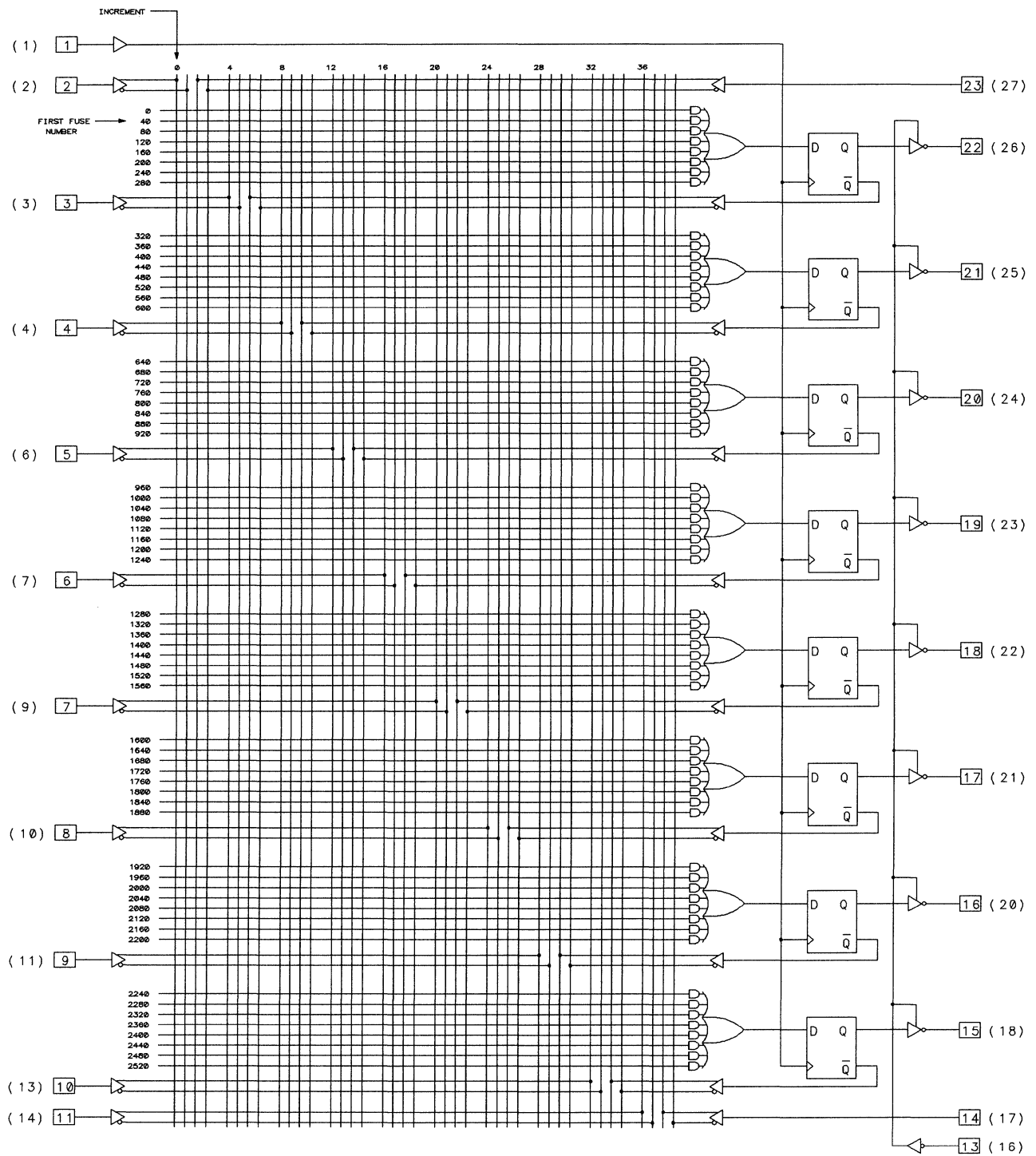
Data I/O Corporation

( 16 ) = PIN NOS. FOR PLCC "NL" PACKAGE

Data I/O Corporation

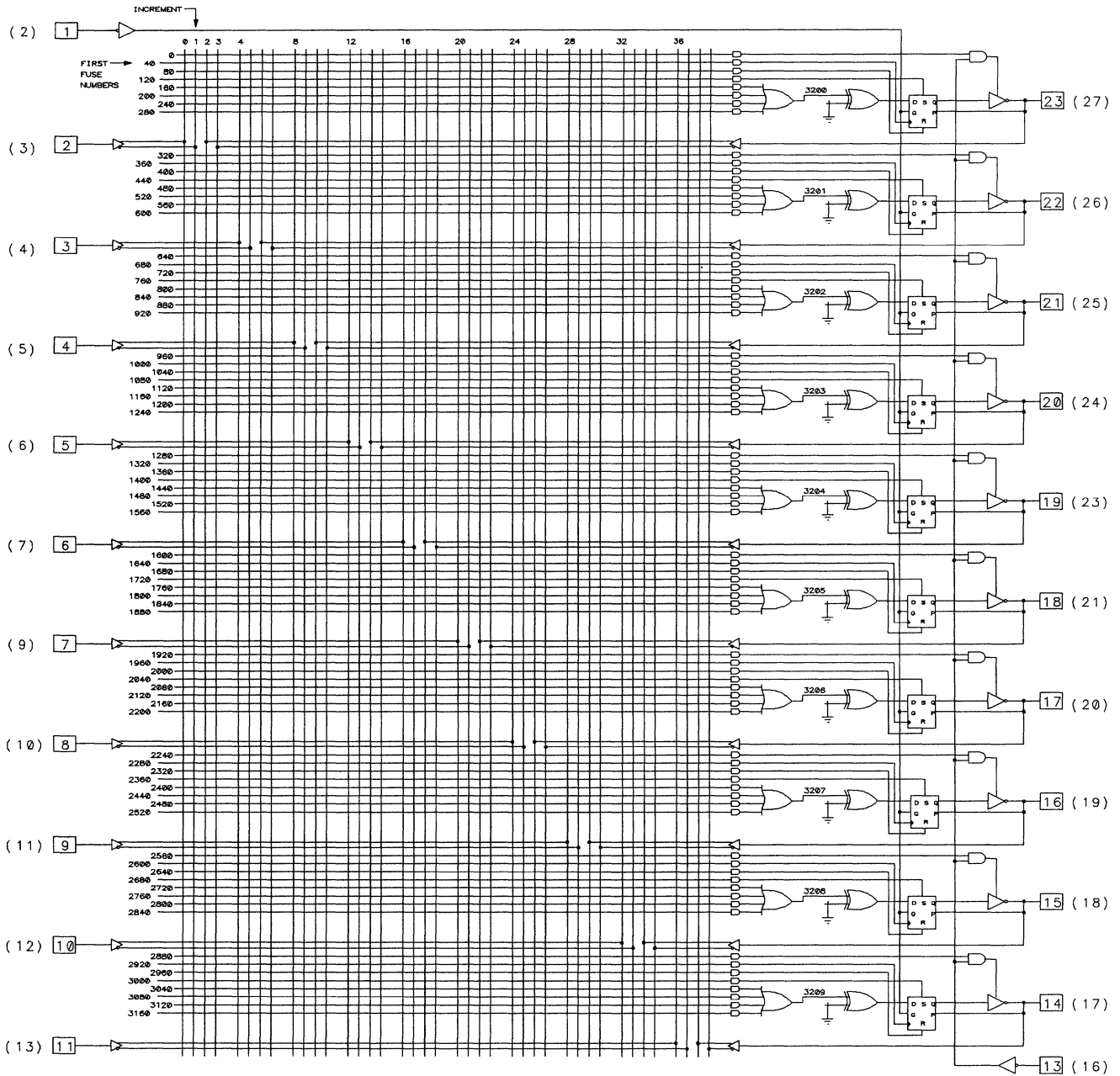


( 16 ) = PIN NOS. FOR PLCC "NL" PACKAGE



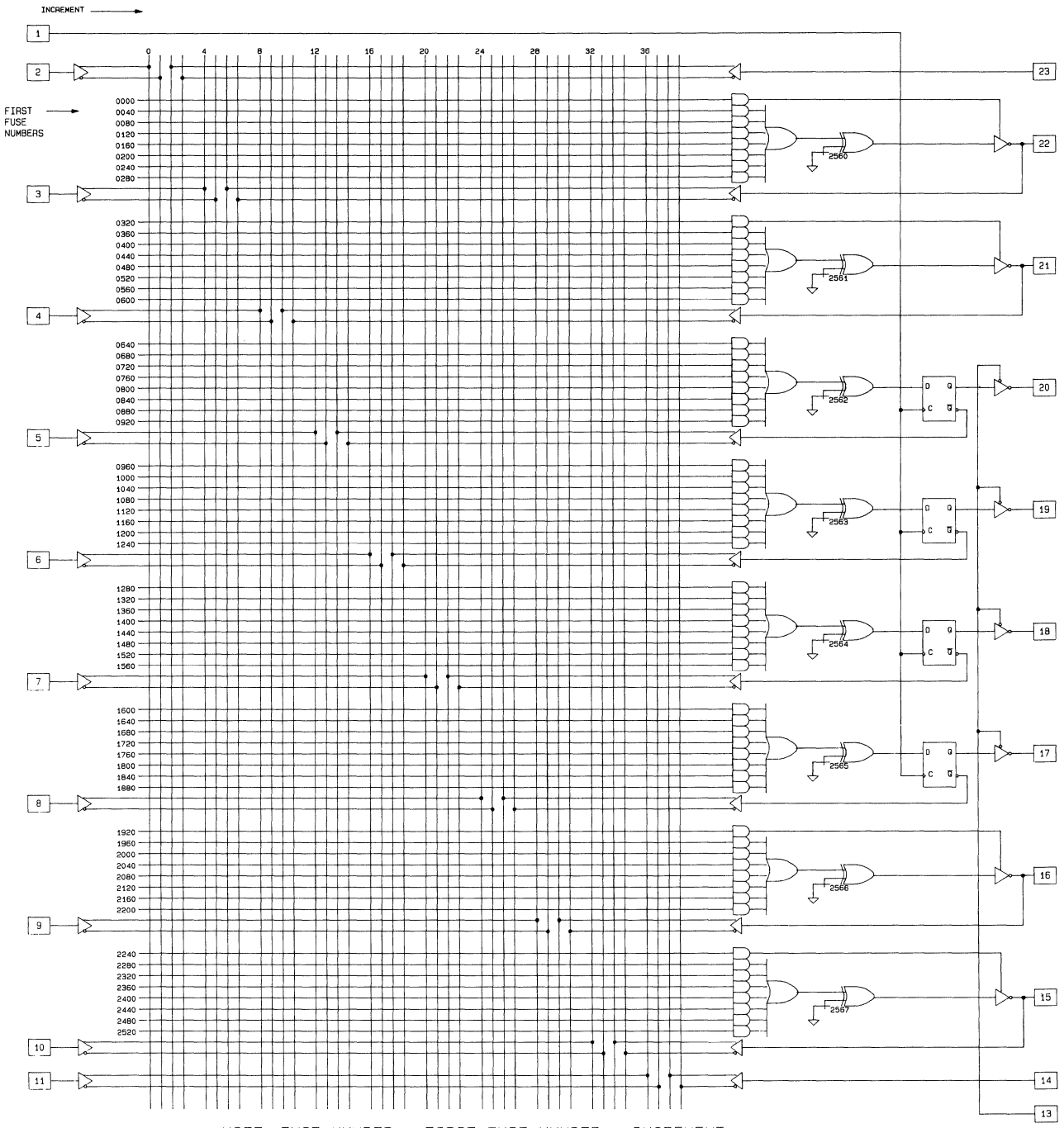
( 16 ) = PIN NOS. FOR PLCC "NL" PACKAGE

Data I/O Corporation



NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

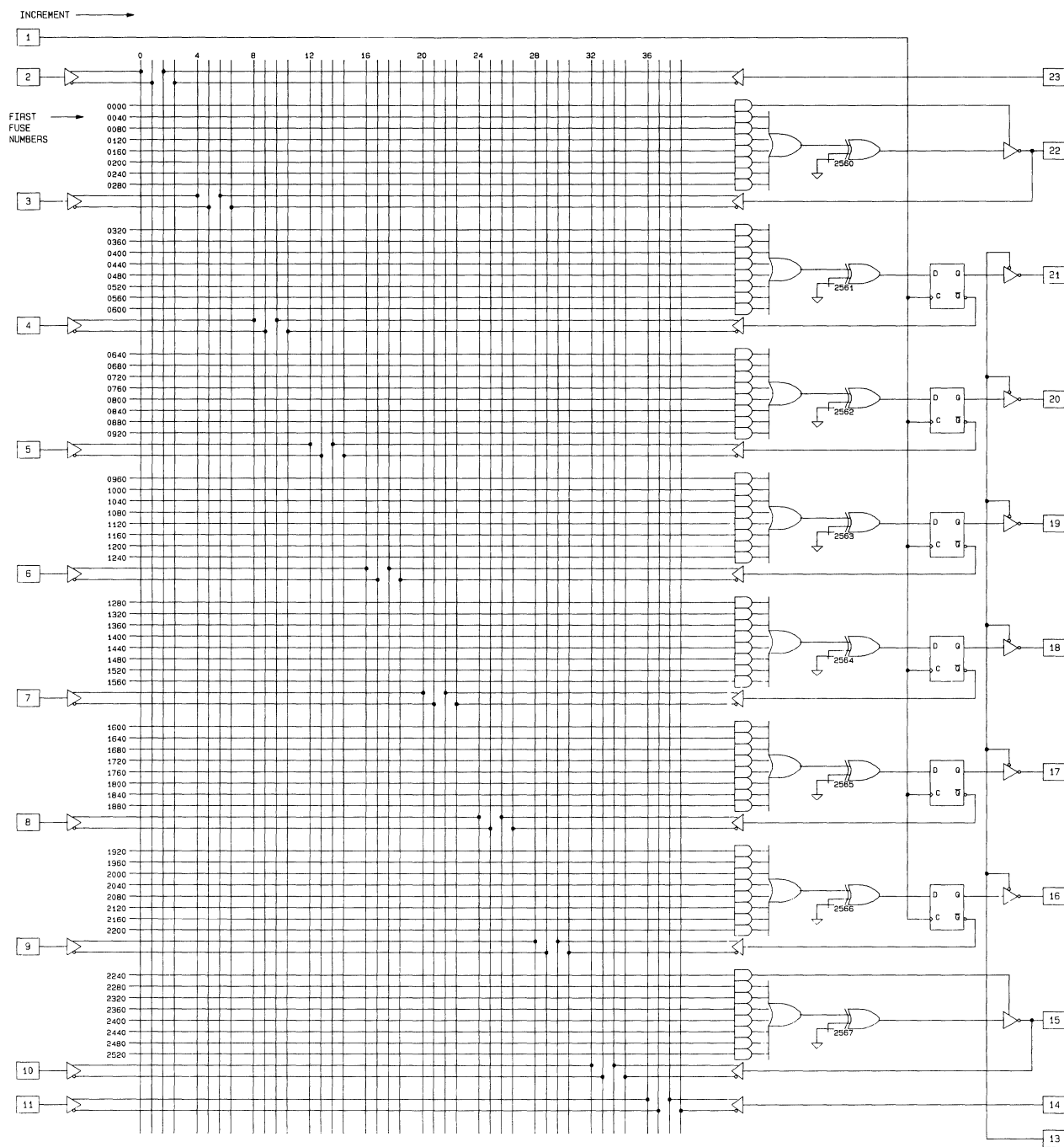
(16) = PIN NOS. FOR PLCC "NL" PACKAGE



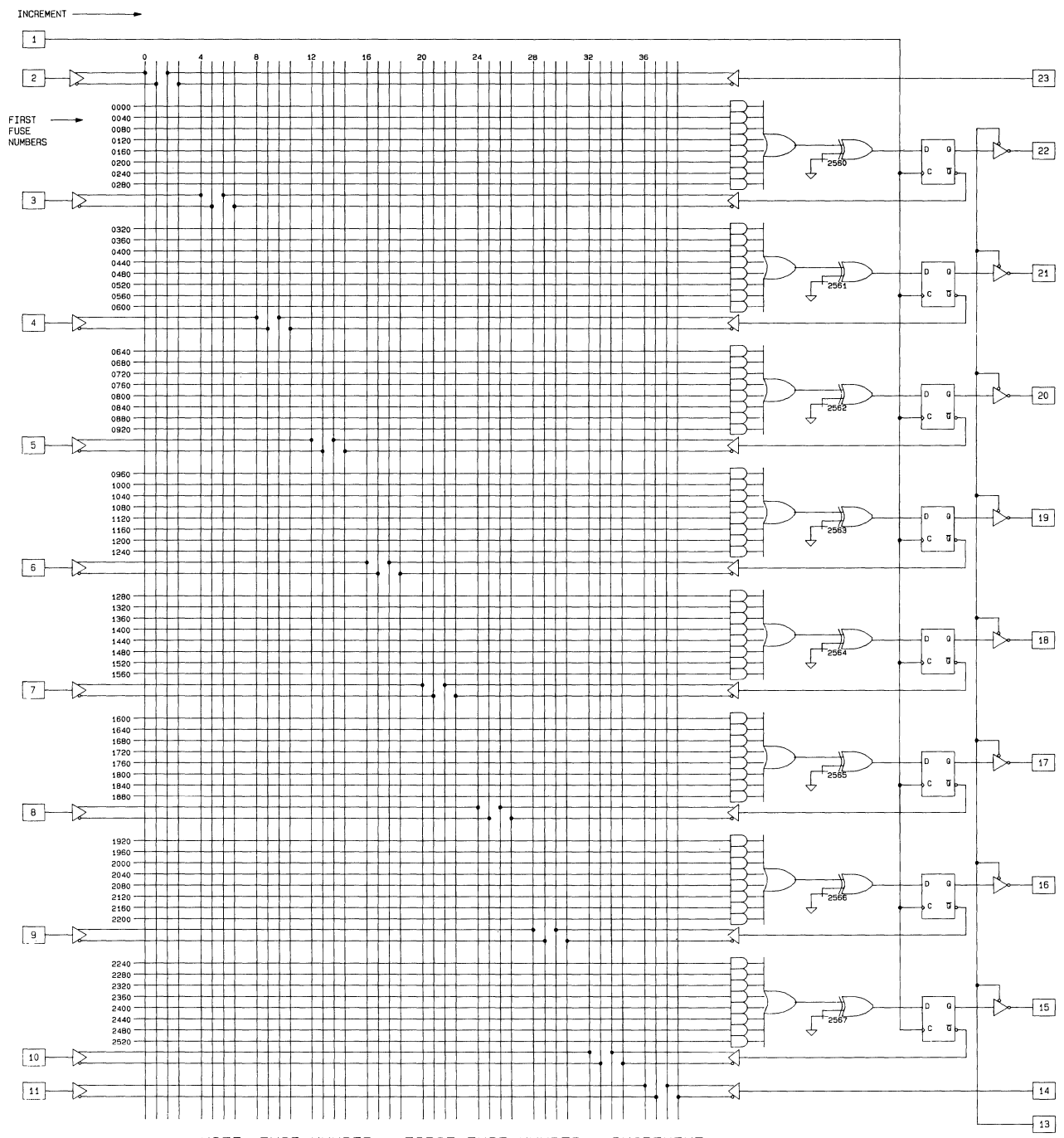
NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

Data I/O Corporation

Data I/O Corporation

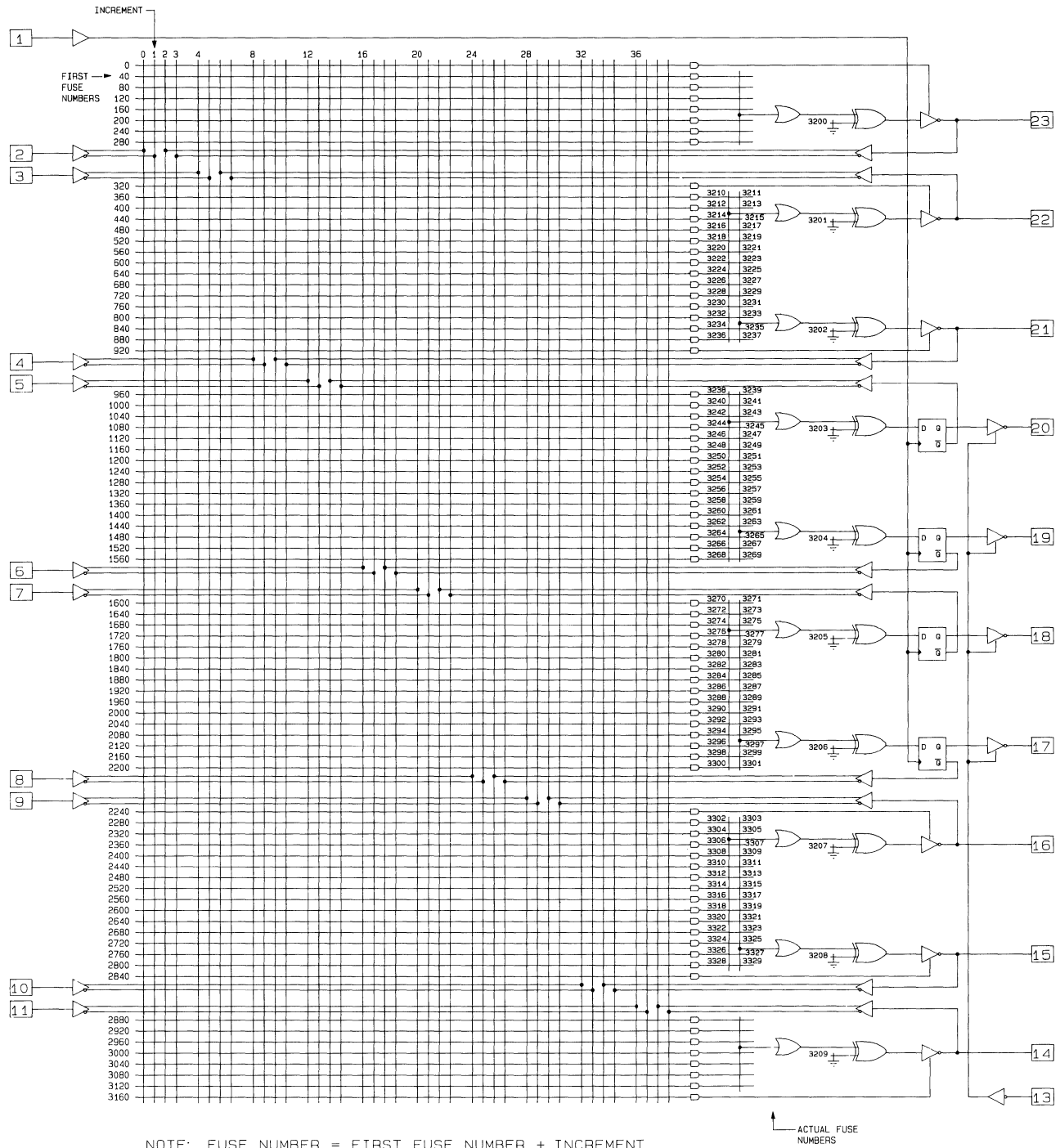


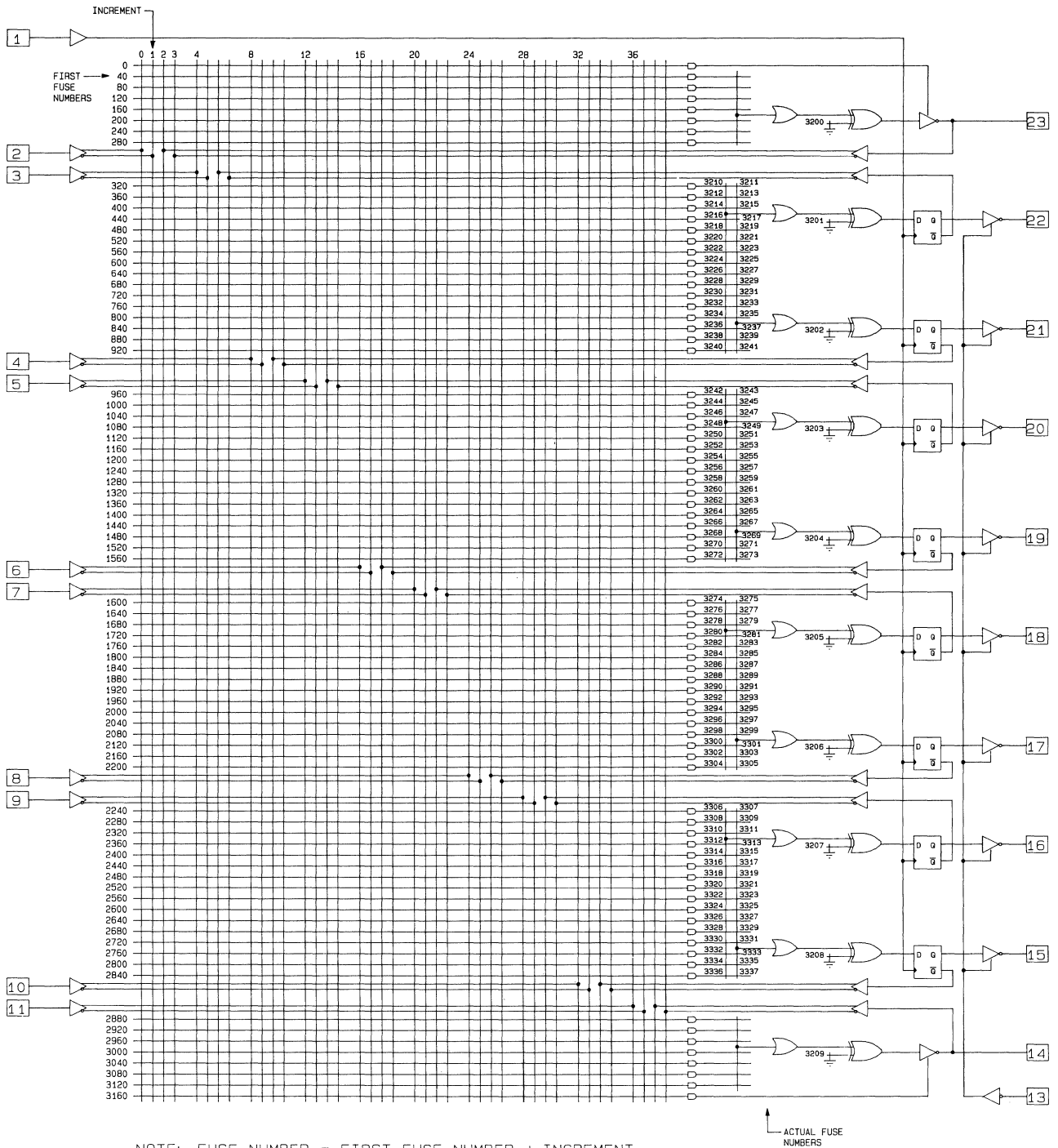
NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT



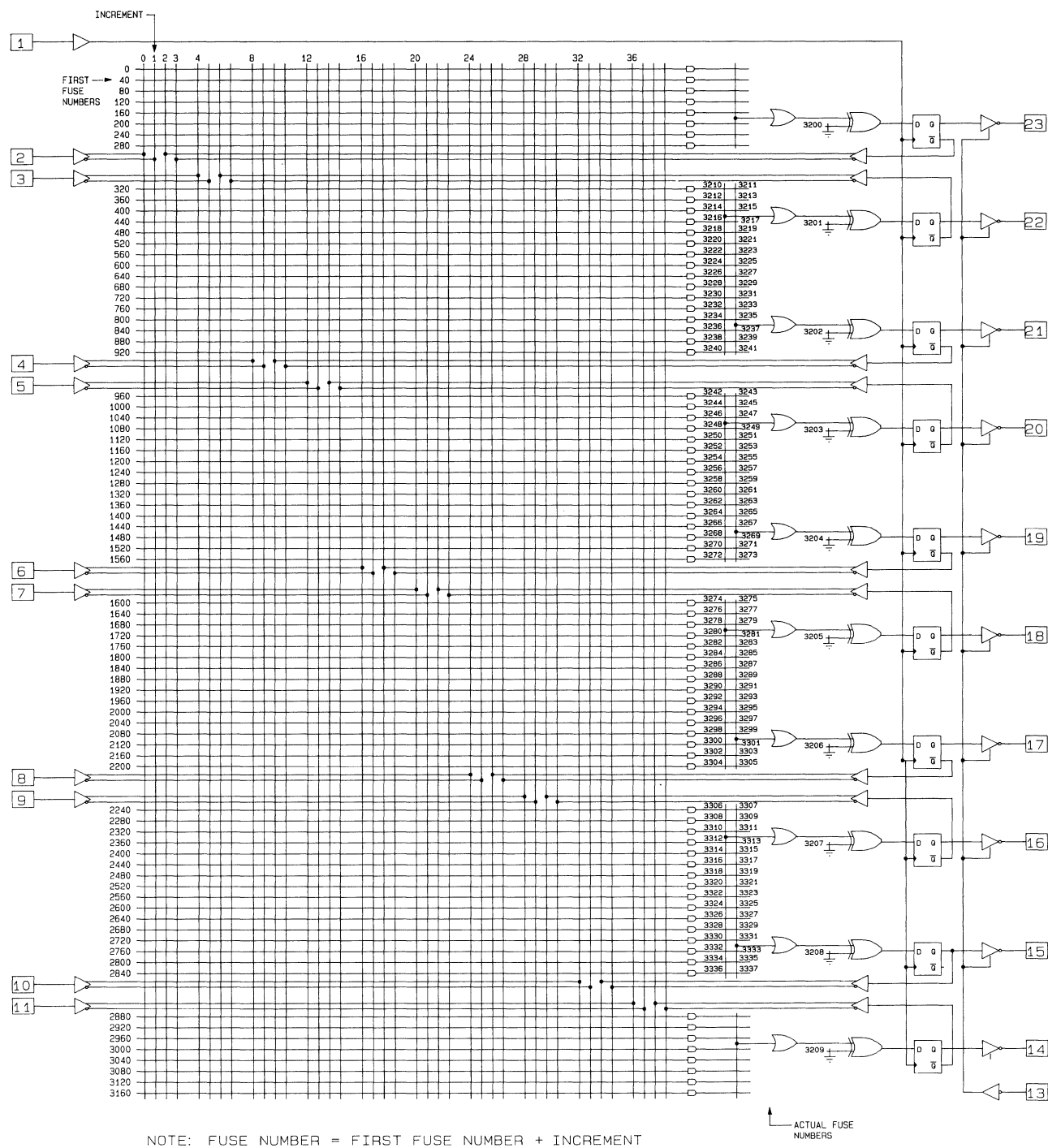


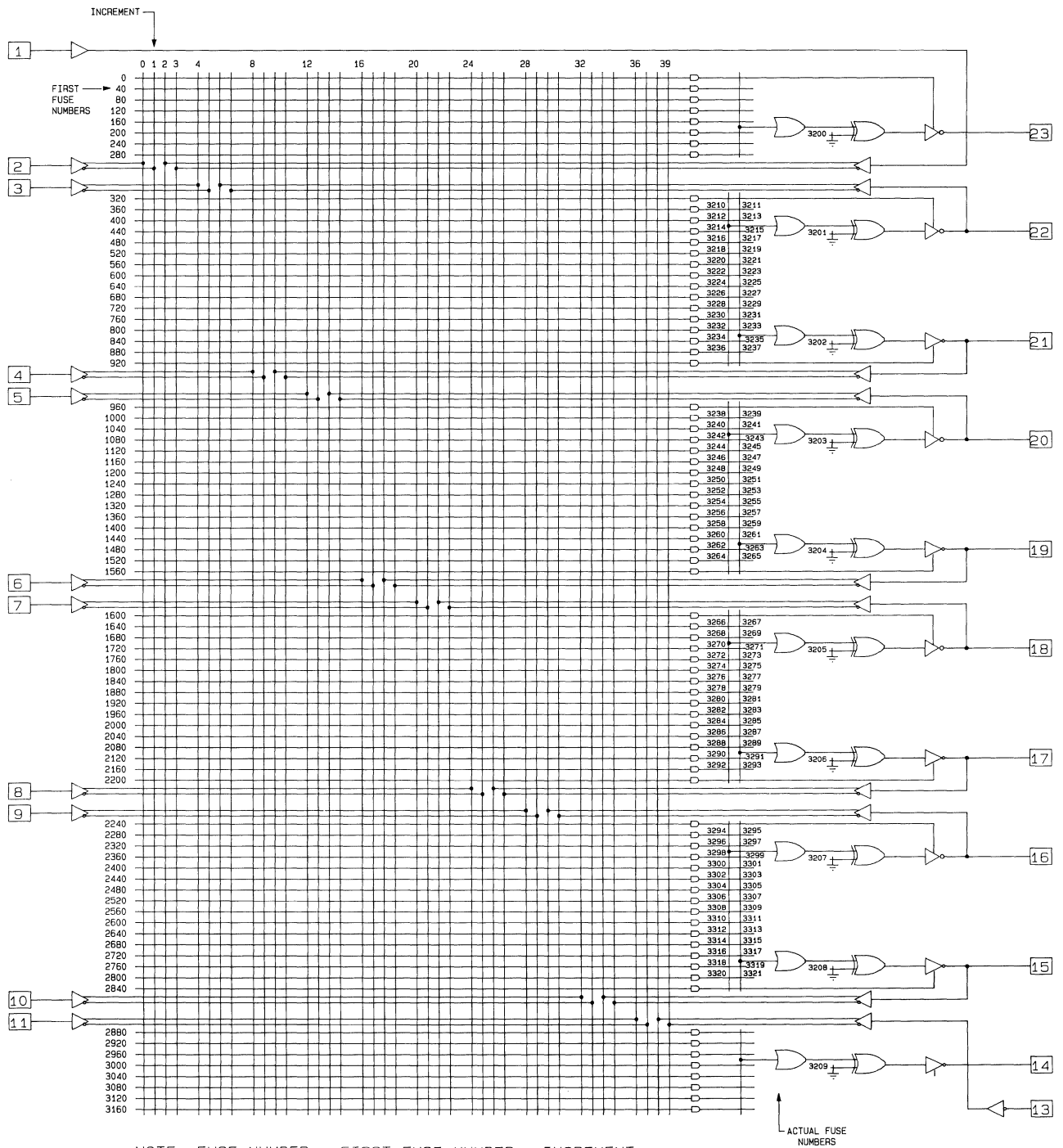
Data I/O Corporation





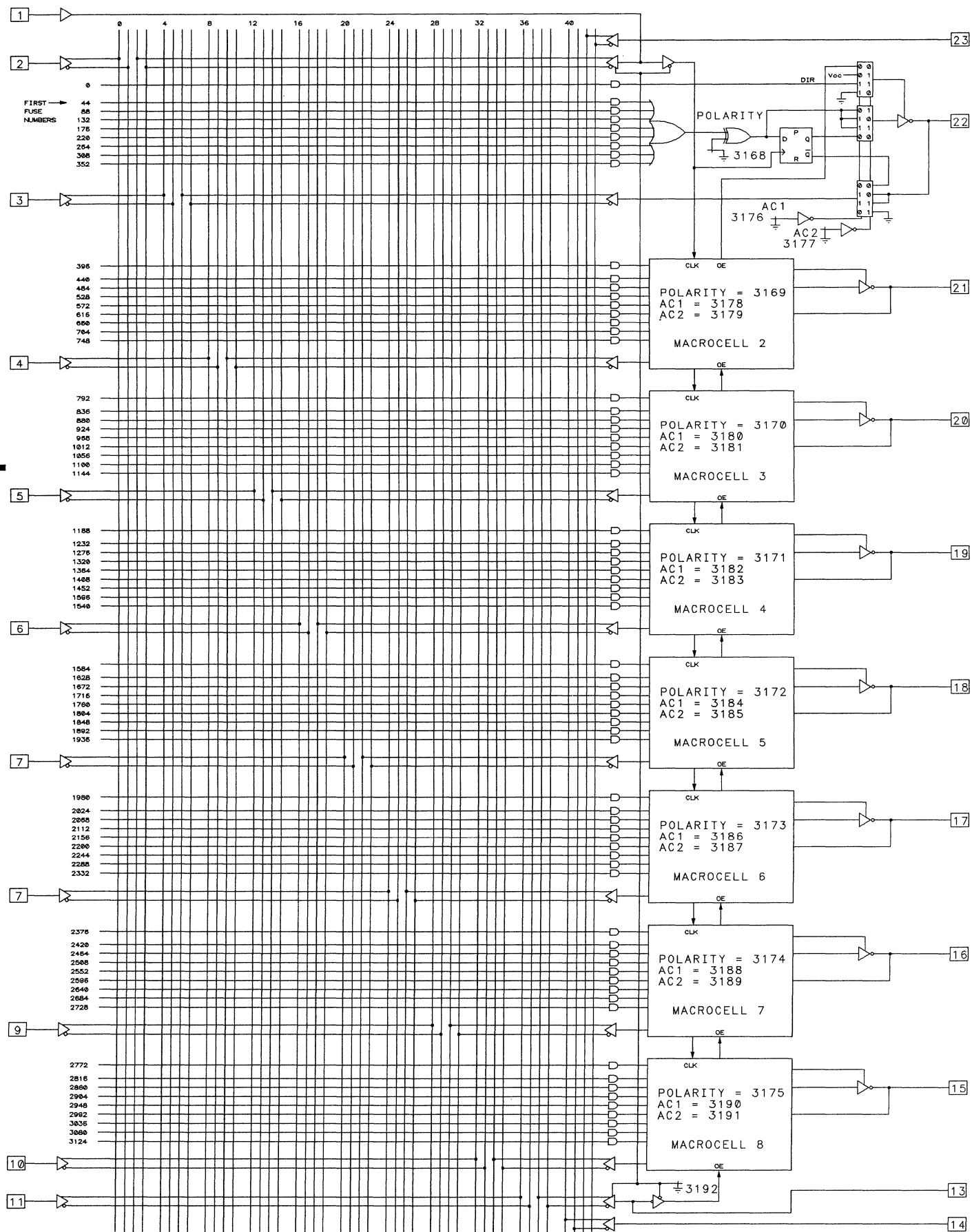
Data I/O Corporation

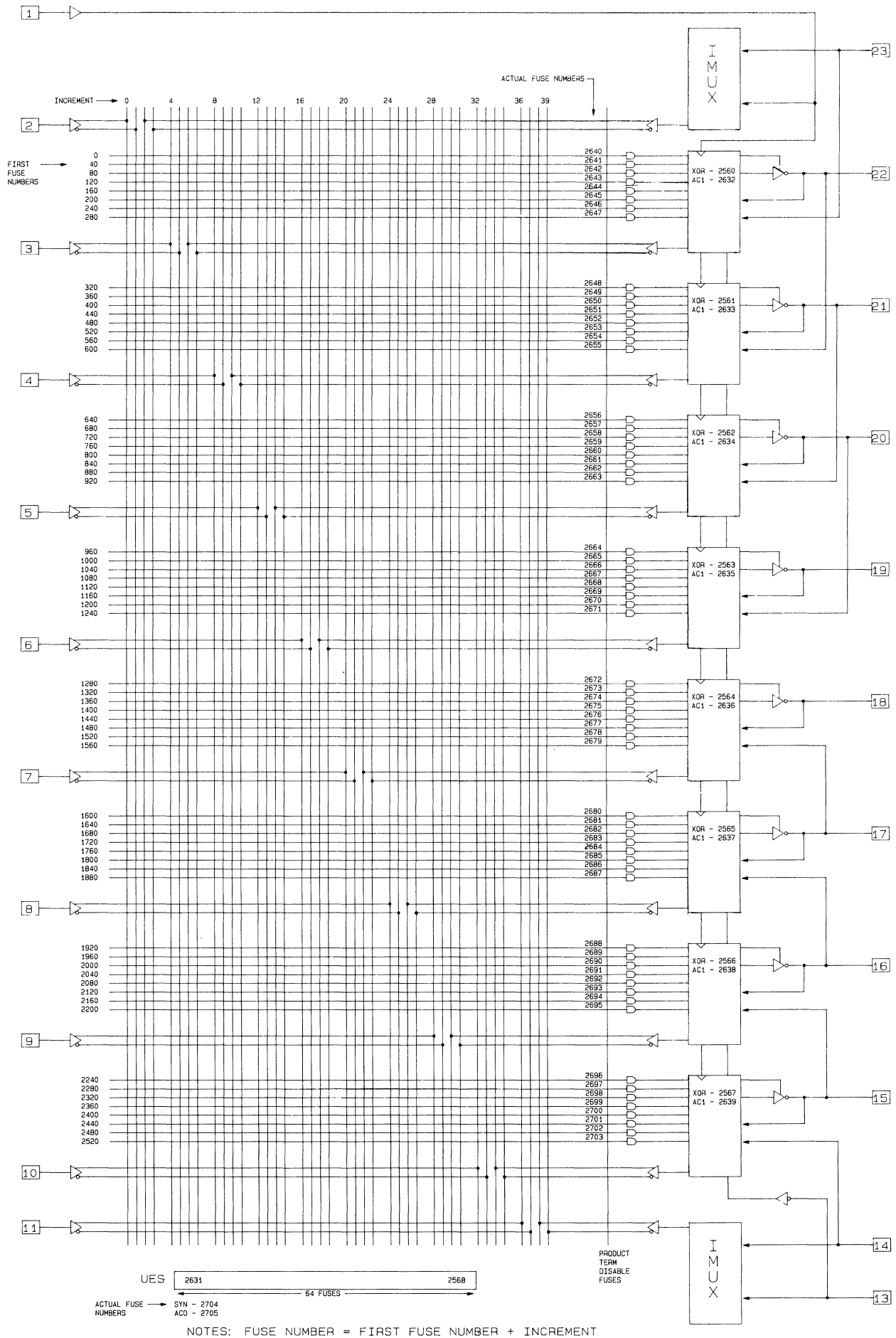




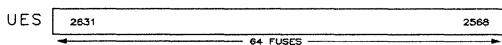
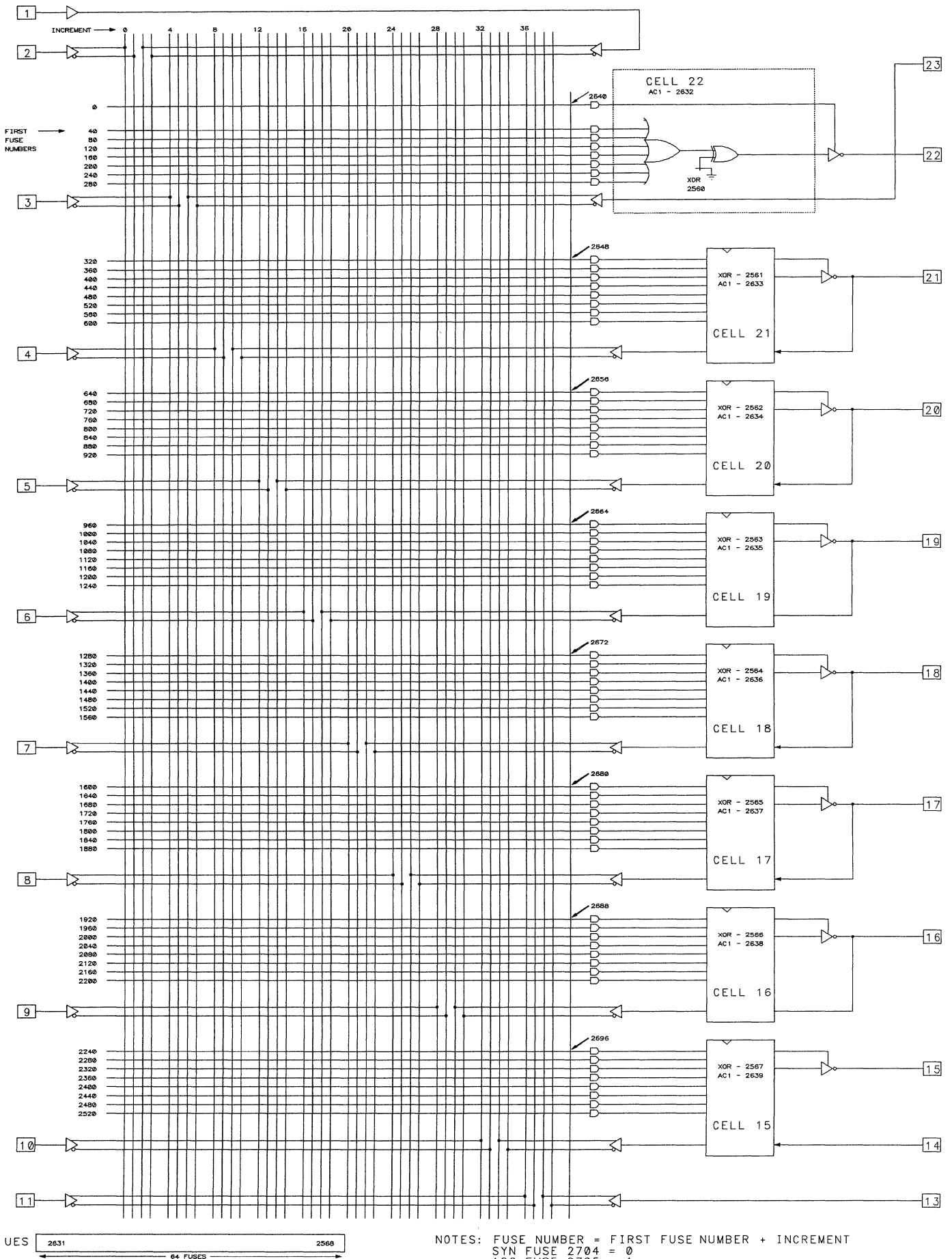
NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

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Data I/O

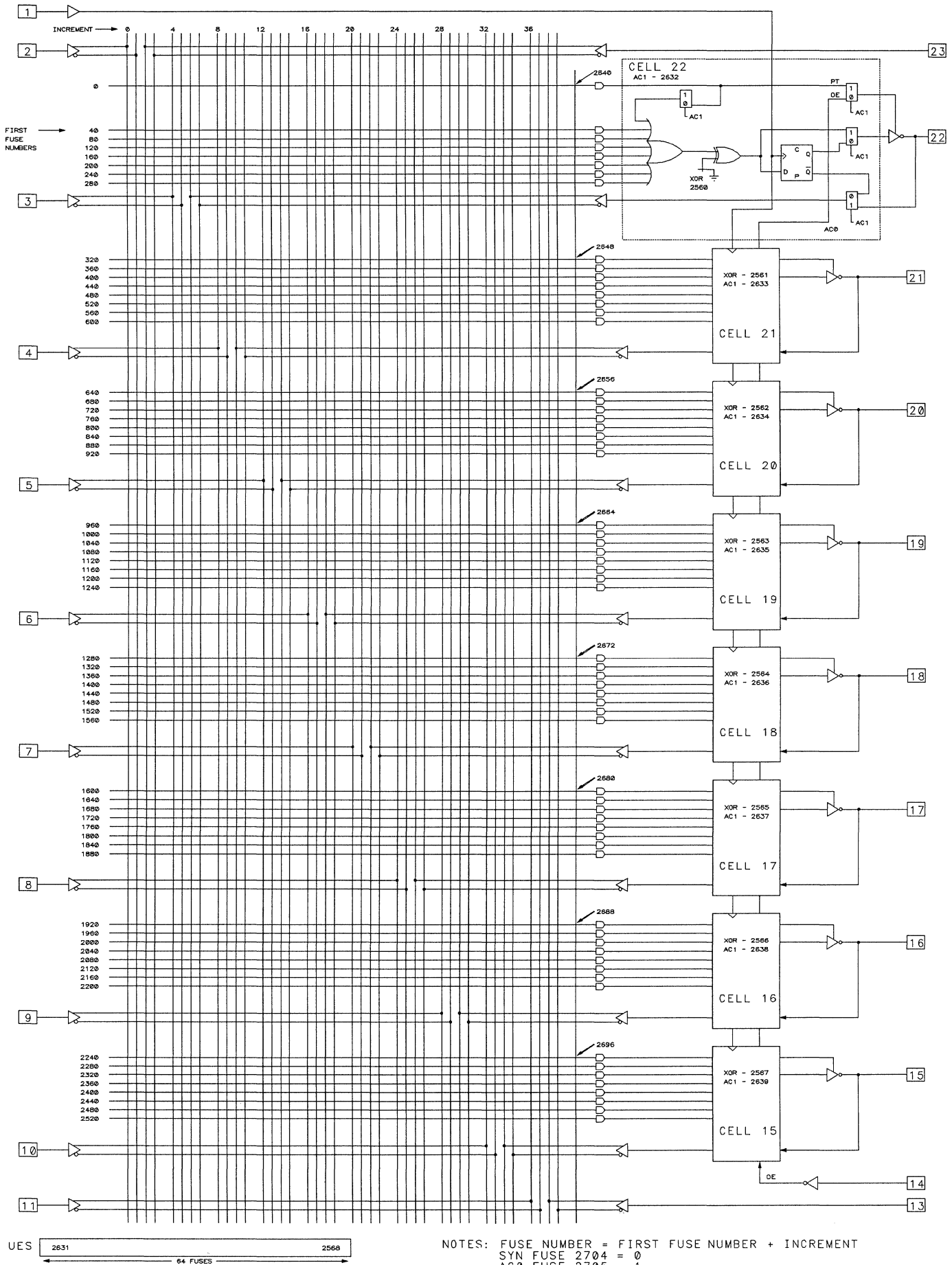




Data I/O Corporation

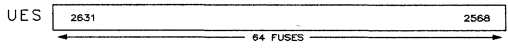


NOTES: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT  
 SYN FUSE 2704 = 0  
 AC0 FUSE 2705 = 1  
 FUSES 2640 - 2703 DISABLE PRODUCT TERMS



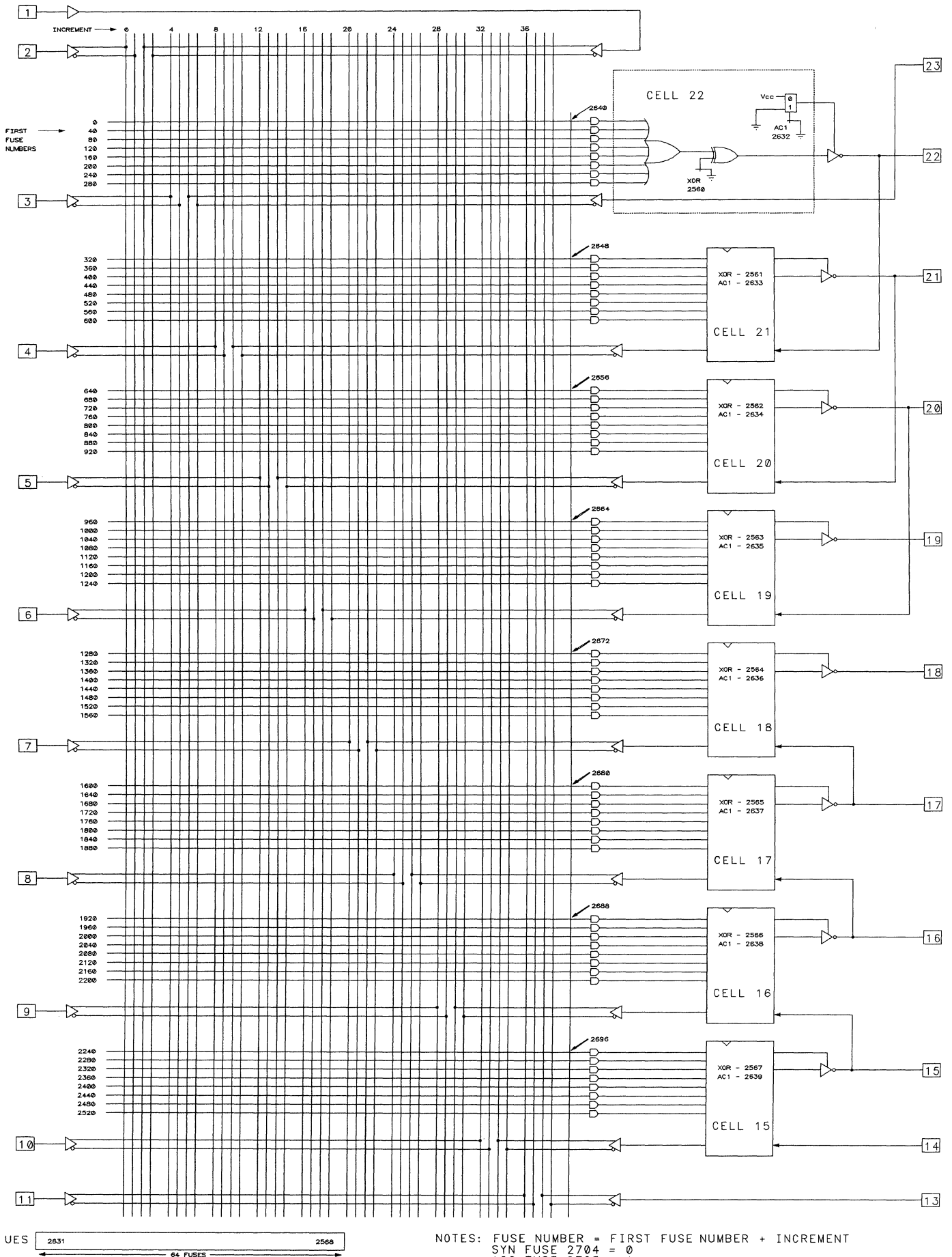
Data I/O Corporation

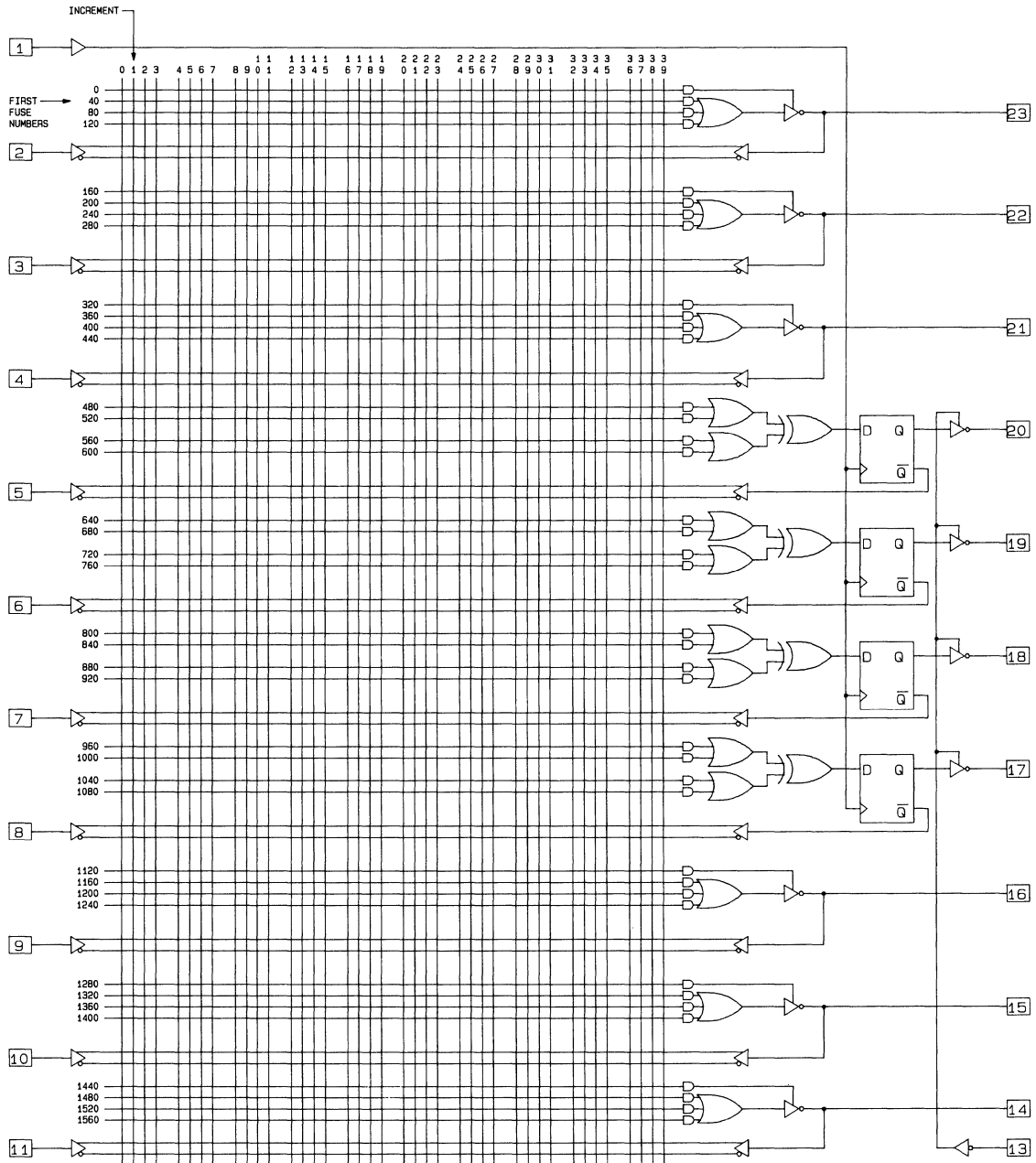
NOTES: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT  
 SYN FUSE 2704 = 0  
 AC0 FUSE 2705 = 1  
 FUSES 2640 - 2703 DISABLE PRODUCT TERMS





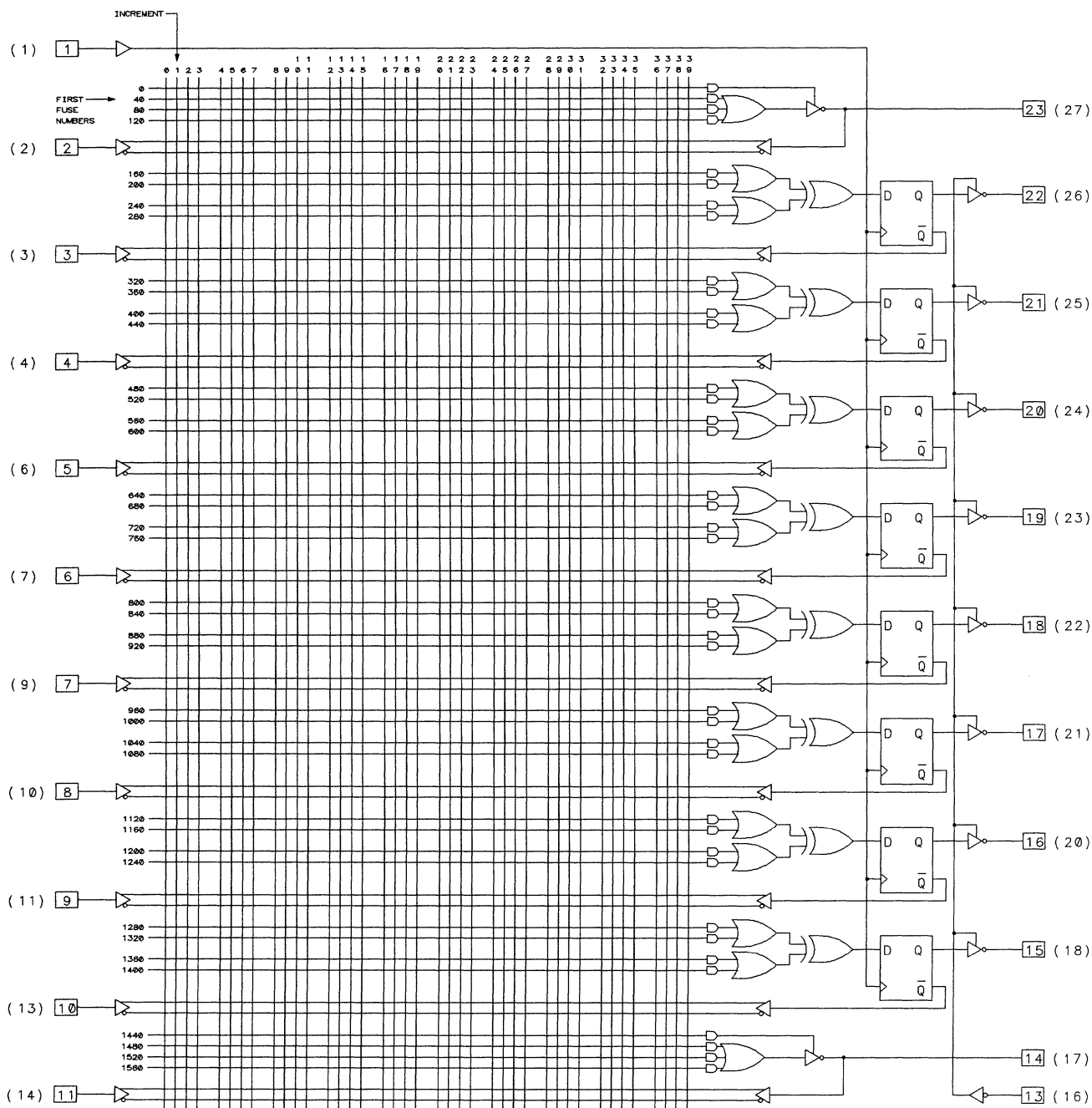
Data I/O Corporation





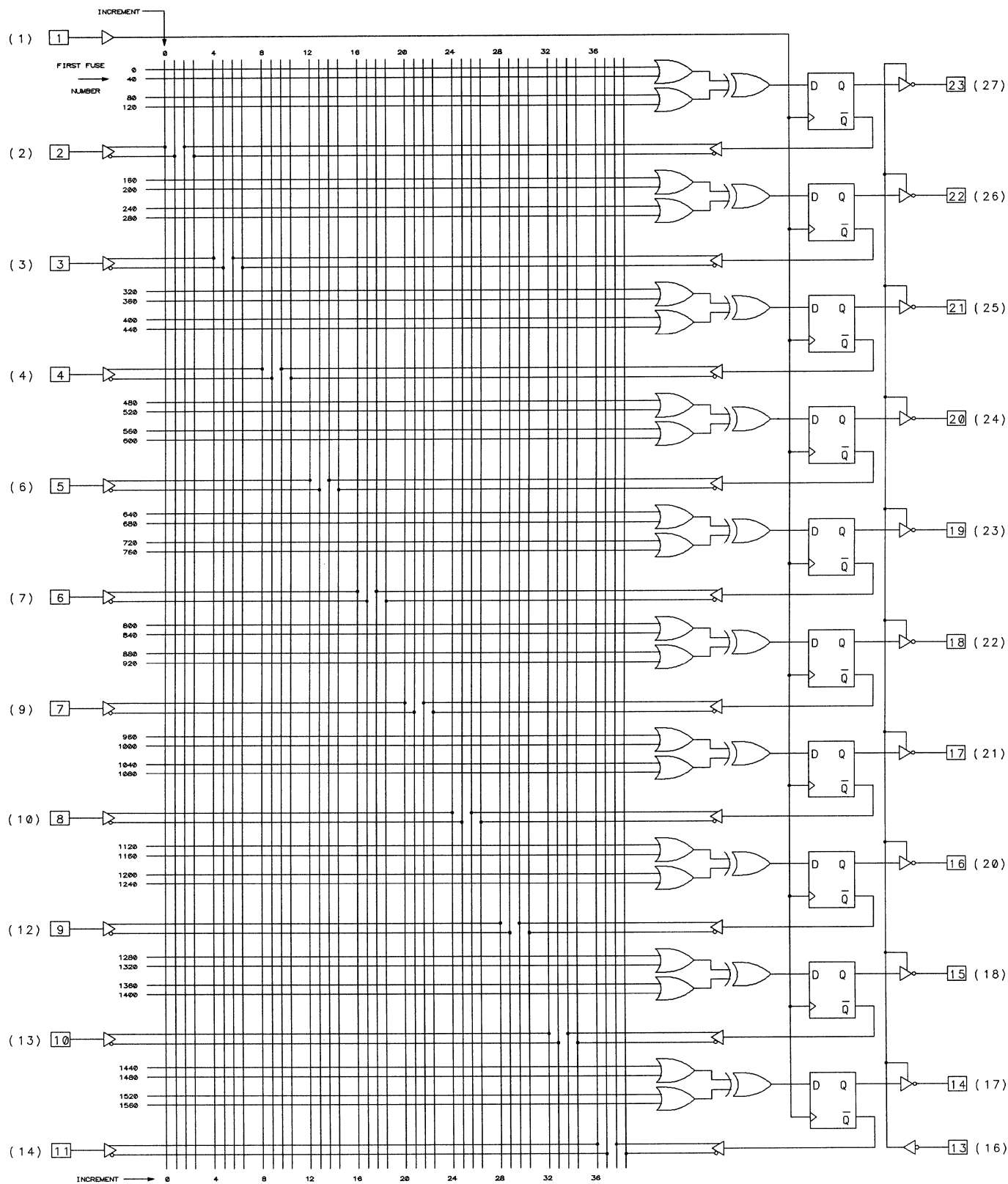
NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

Data I/O Corporation



NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

(16) = PIN NOS. FOR PLCC "NL" PACKAGE

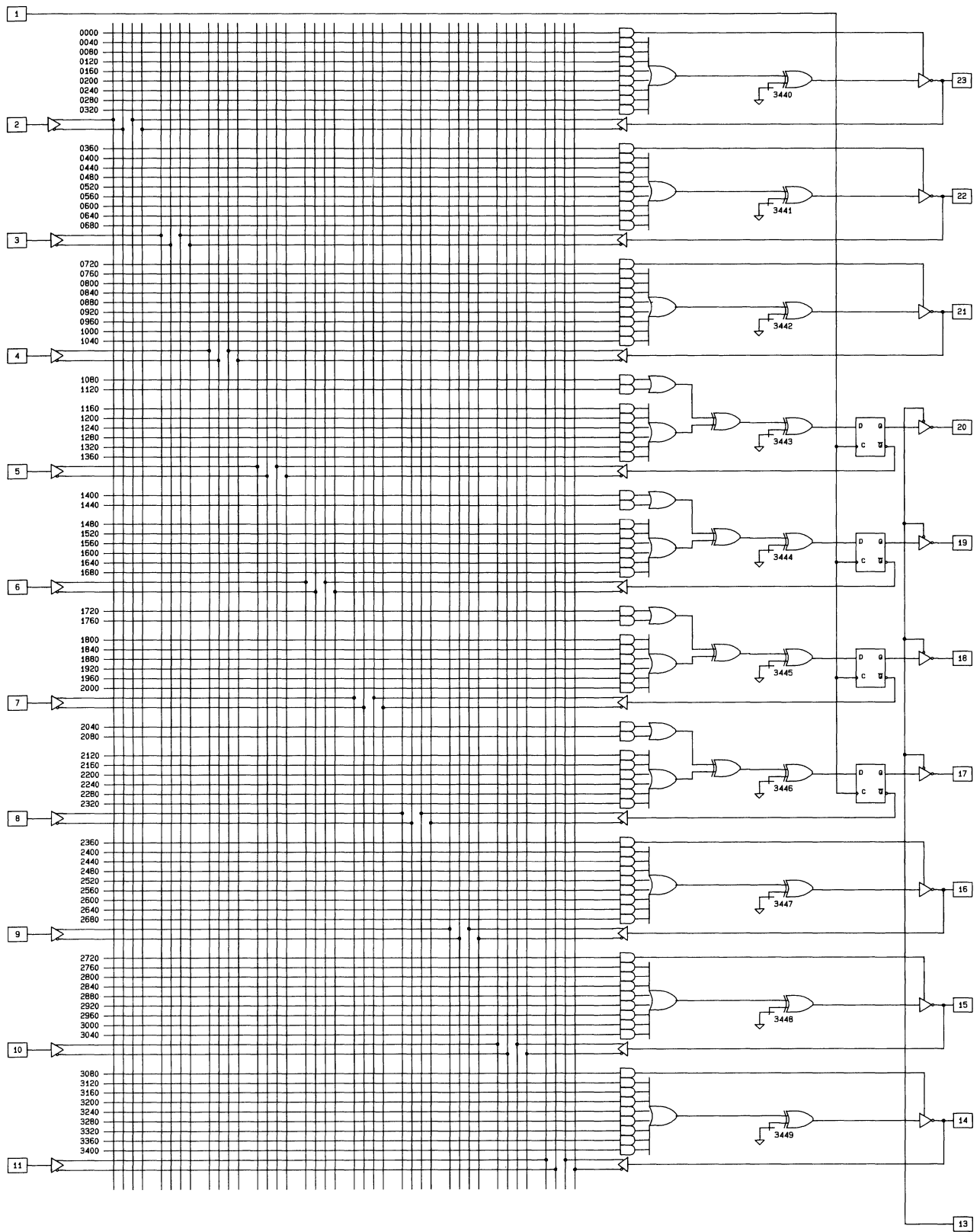


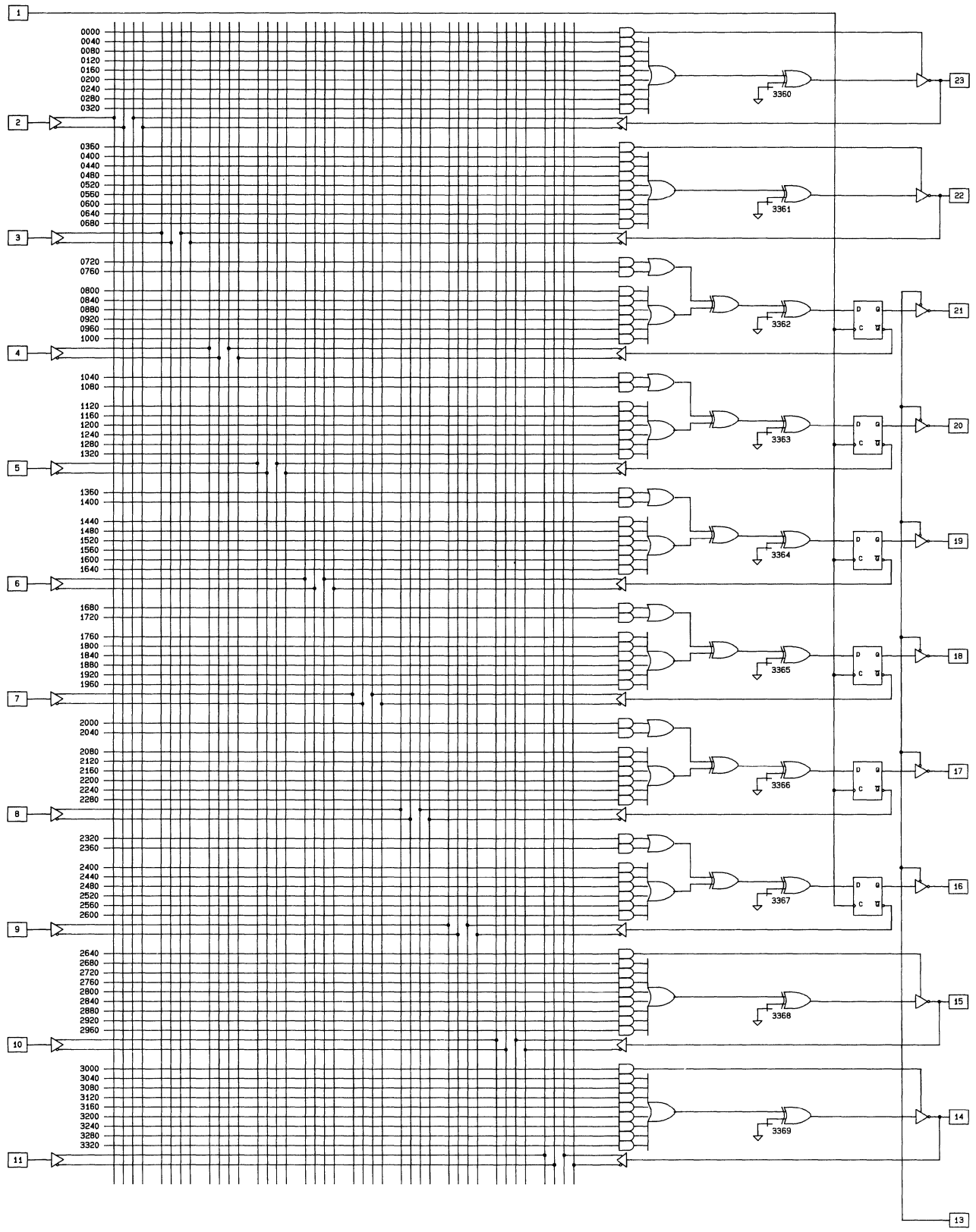
NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

(16) = PIN NOS. FOR PLCC "NL" PACKAGE

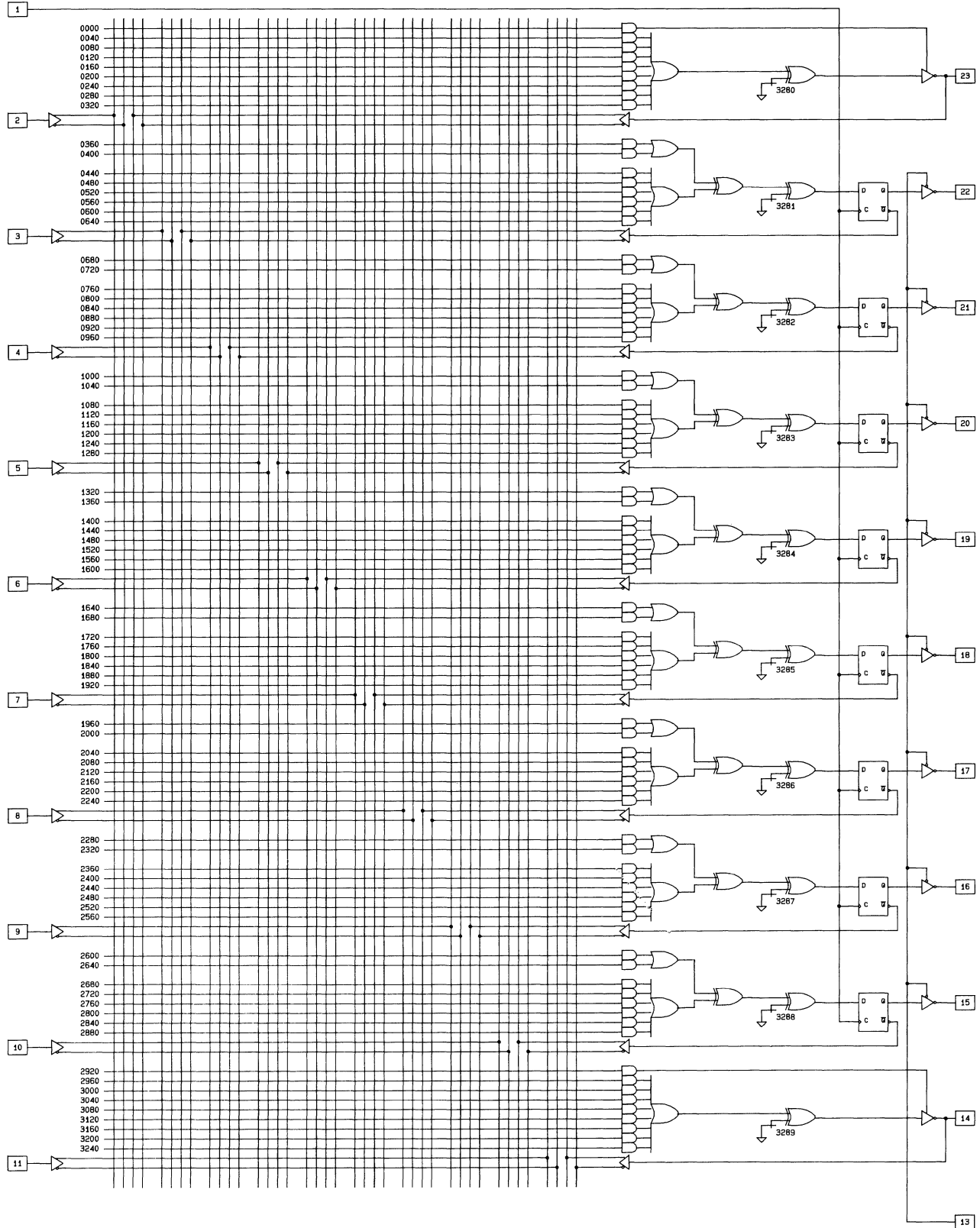
Data I/O Corporation

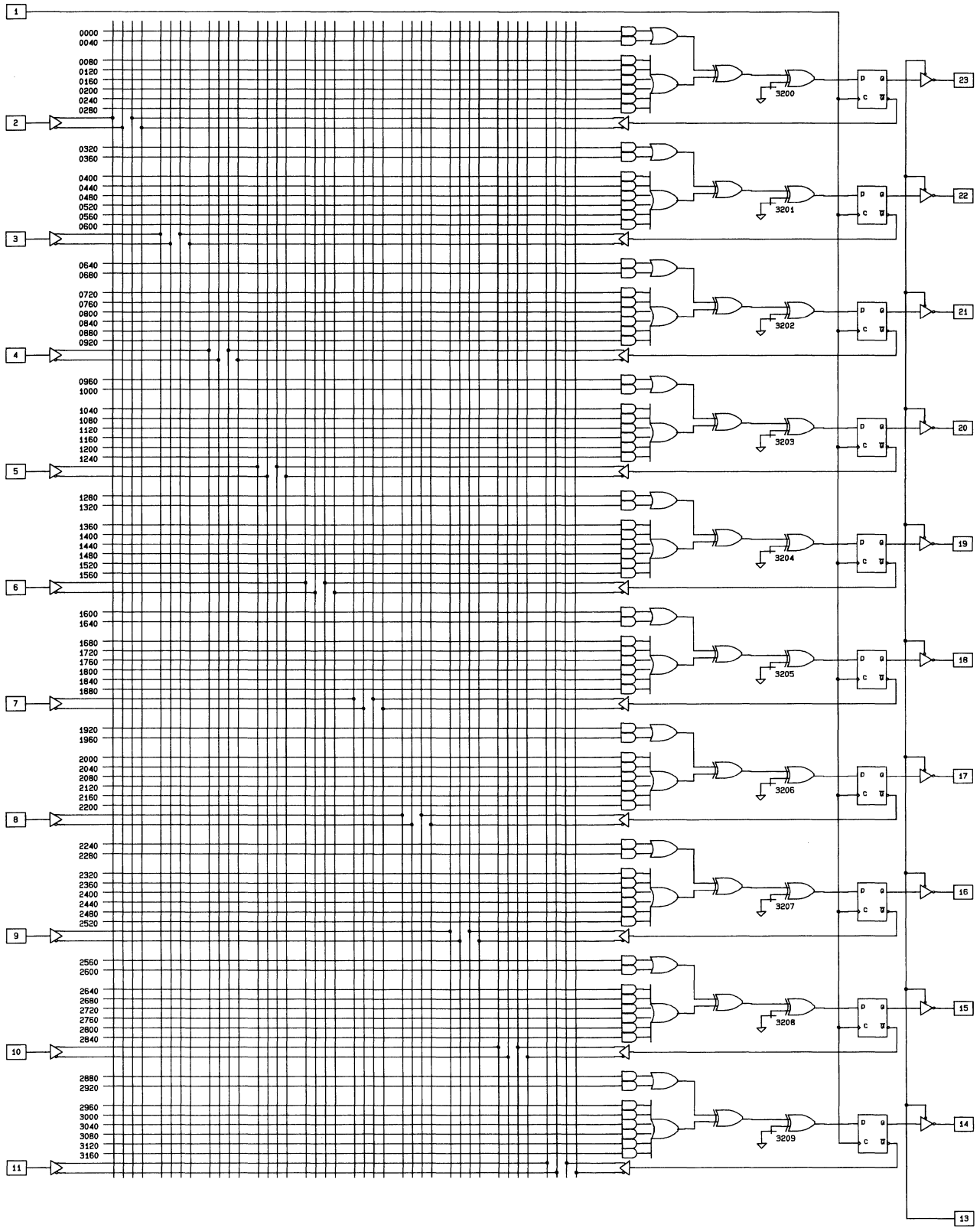
Corporation  
Data I/O





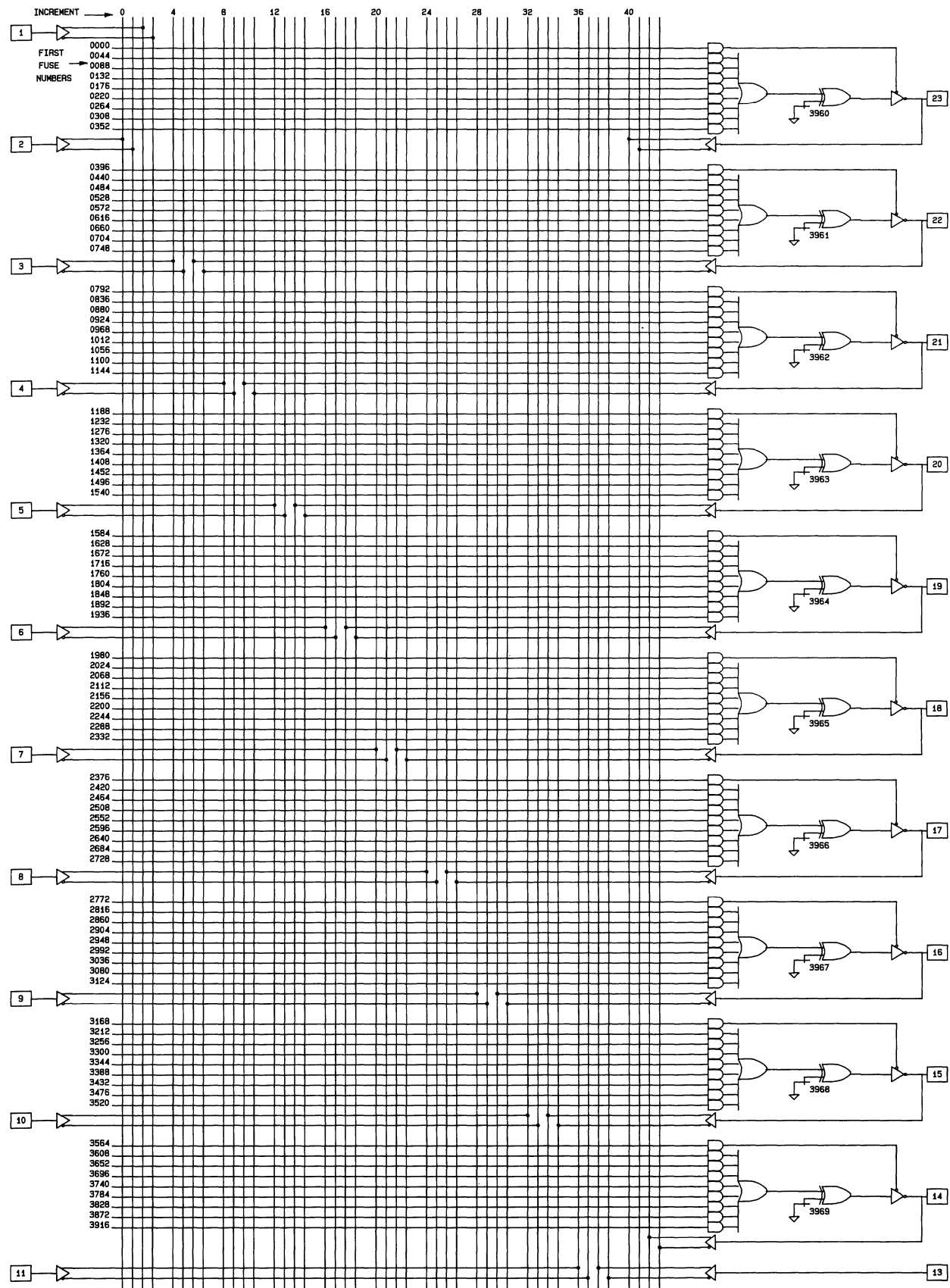
Corporation  
Data I/O



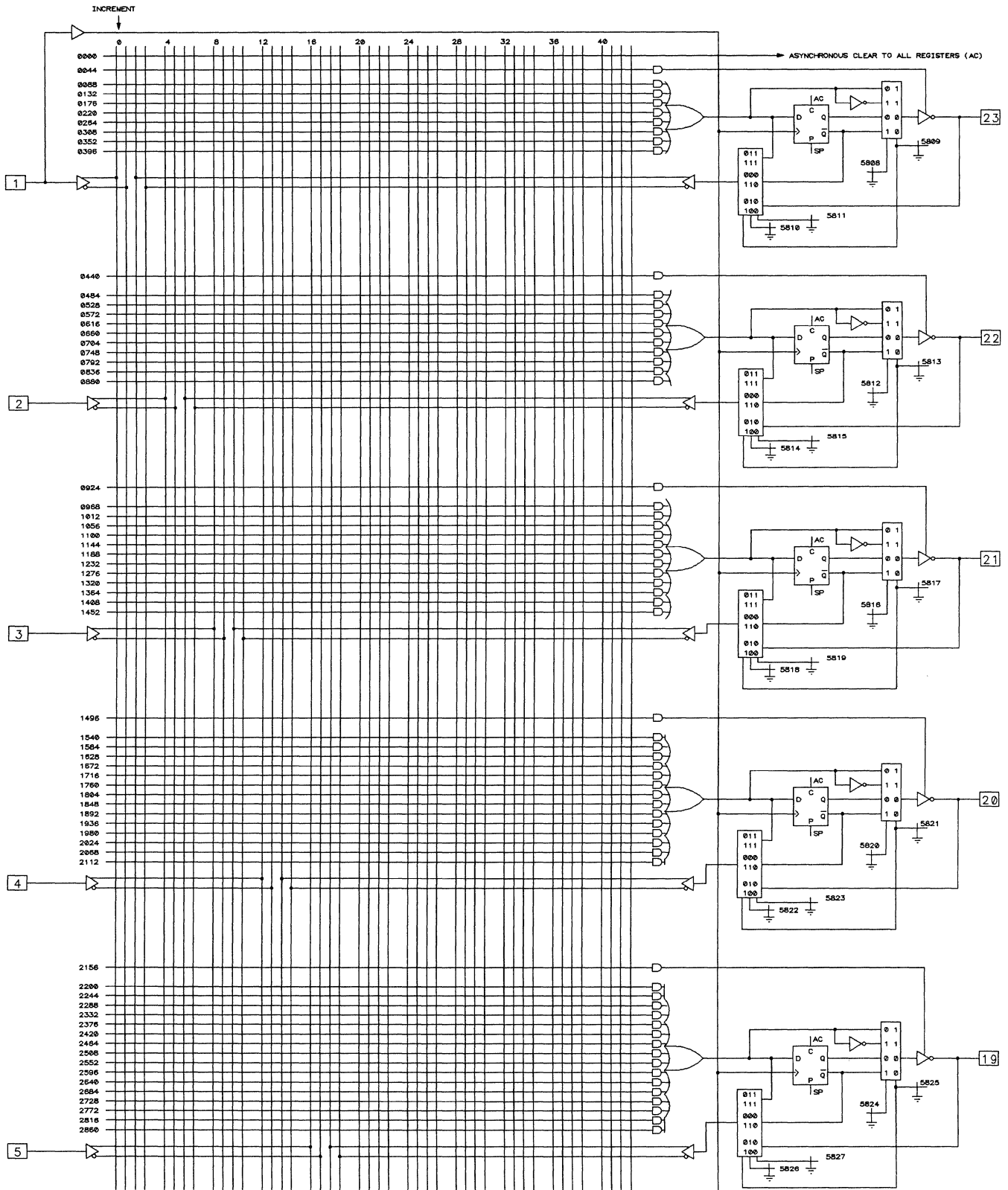




Corporation  
Data I/O

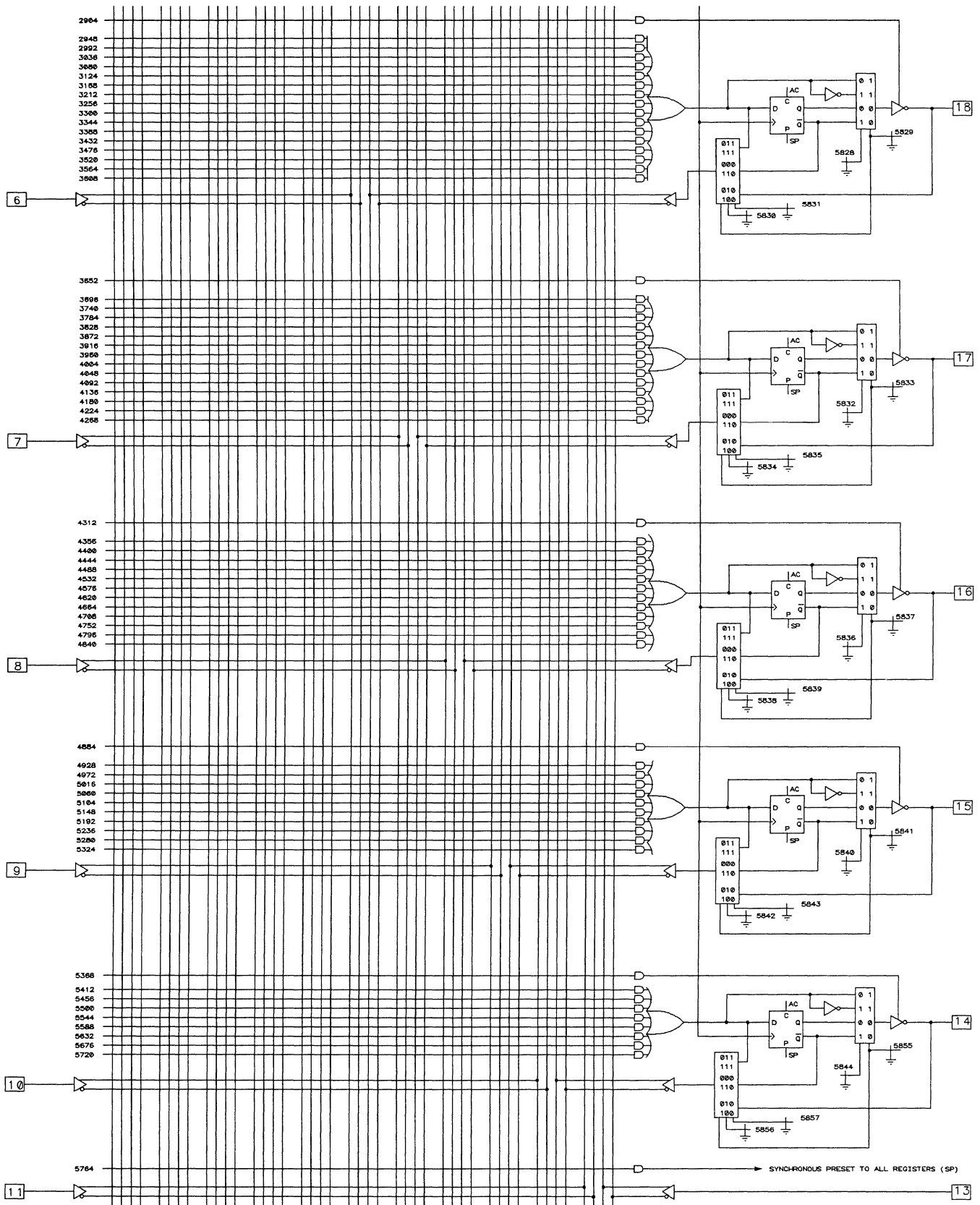


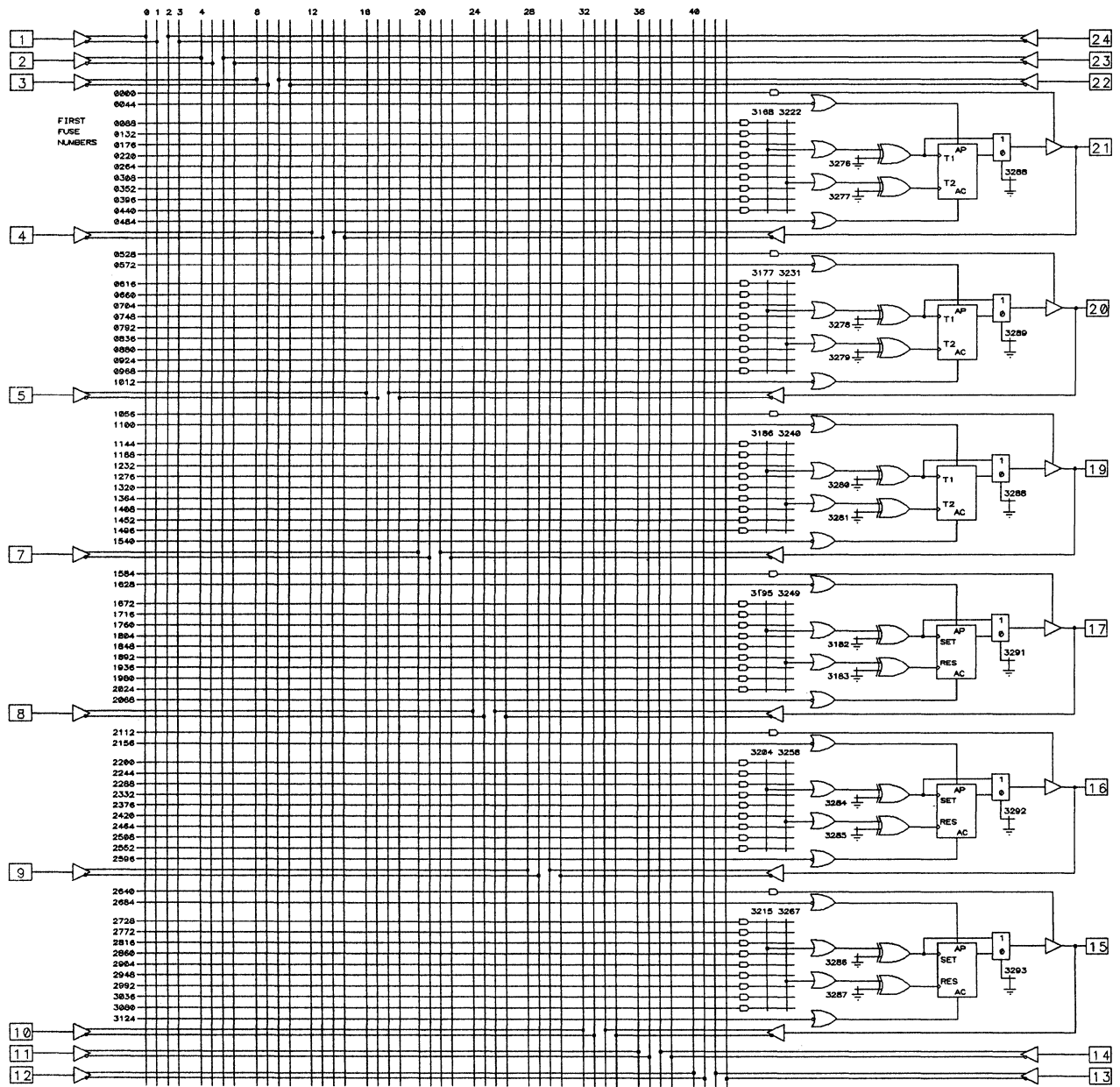
FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT



Data I/O Corporation

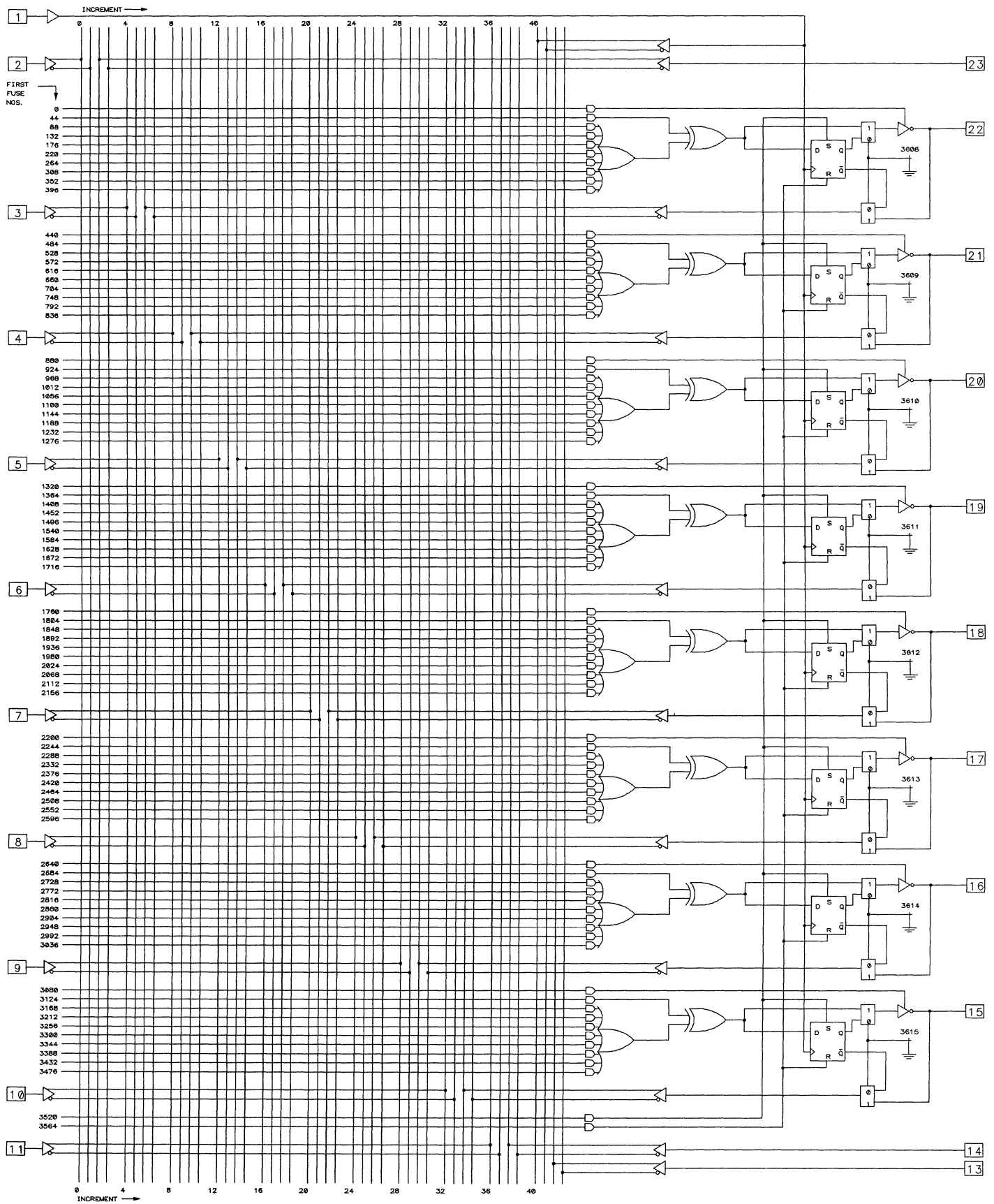
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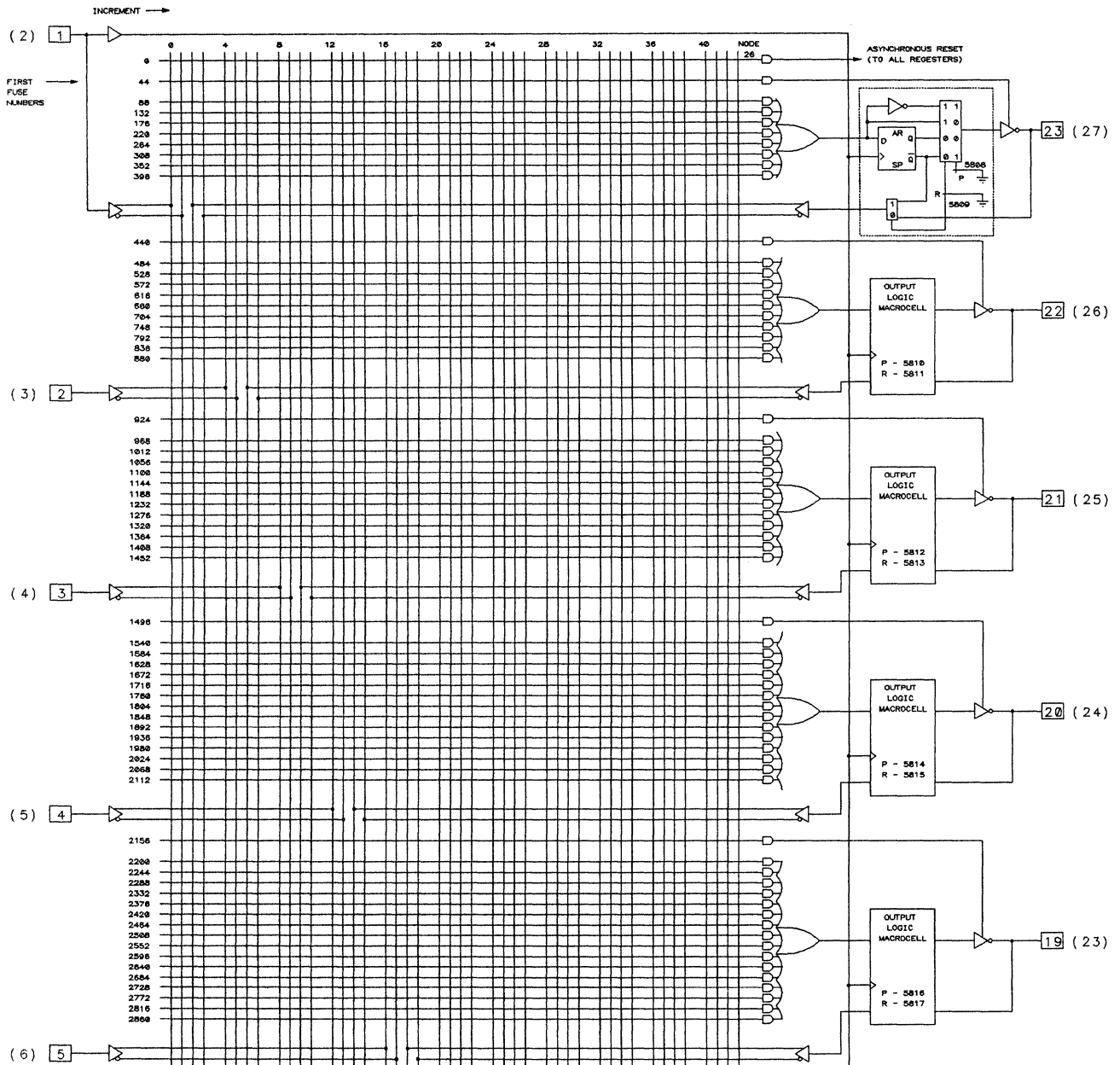


Data I/O Corporation

Corporation  
Data I/O

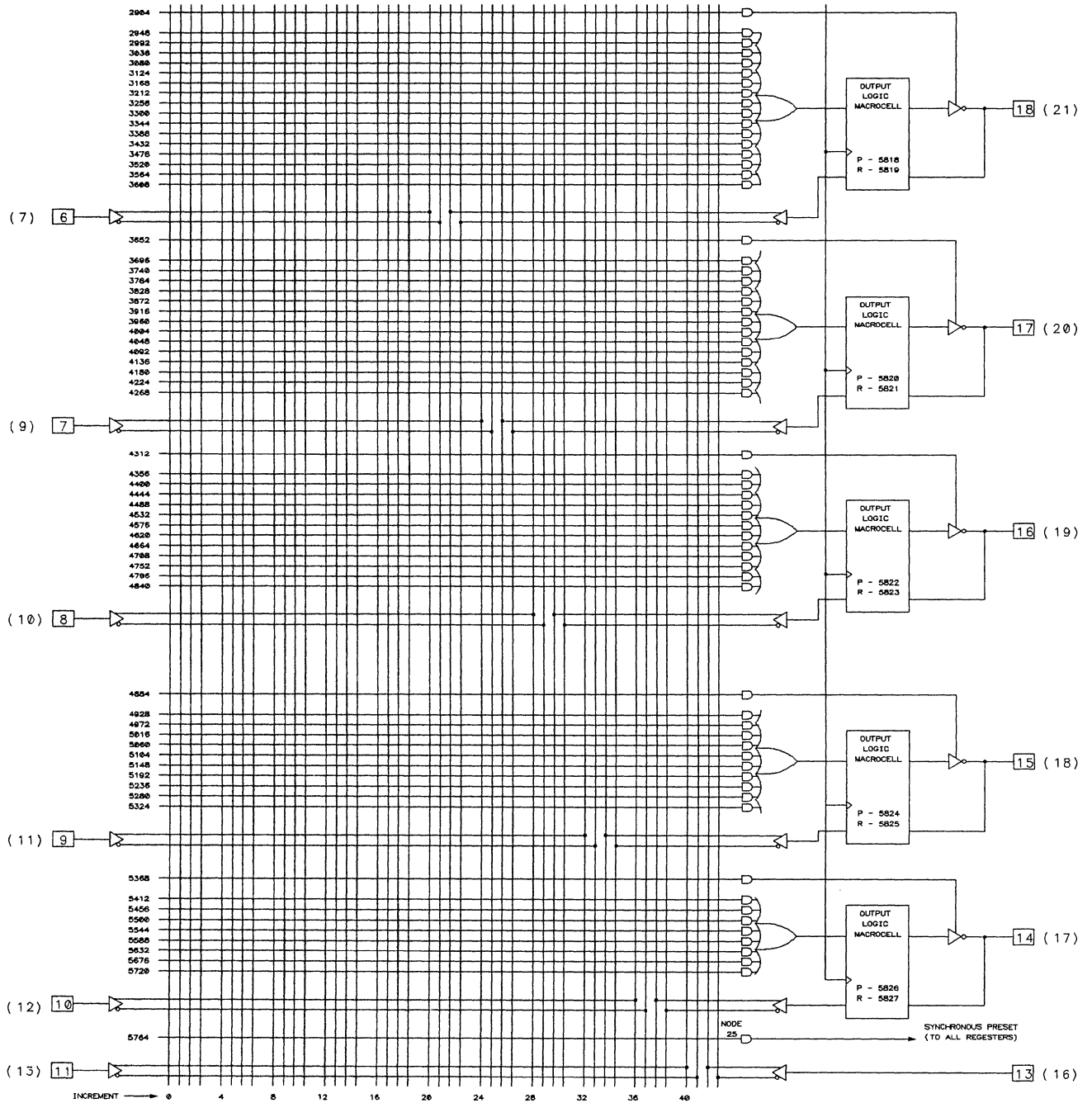


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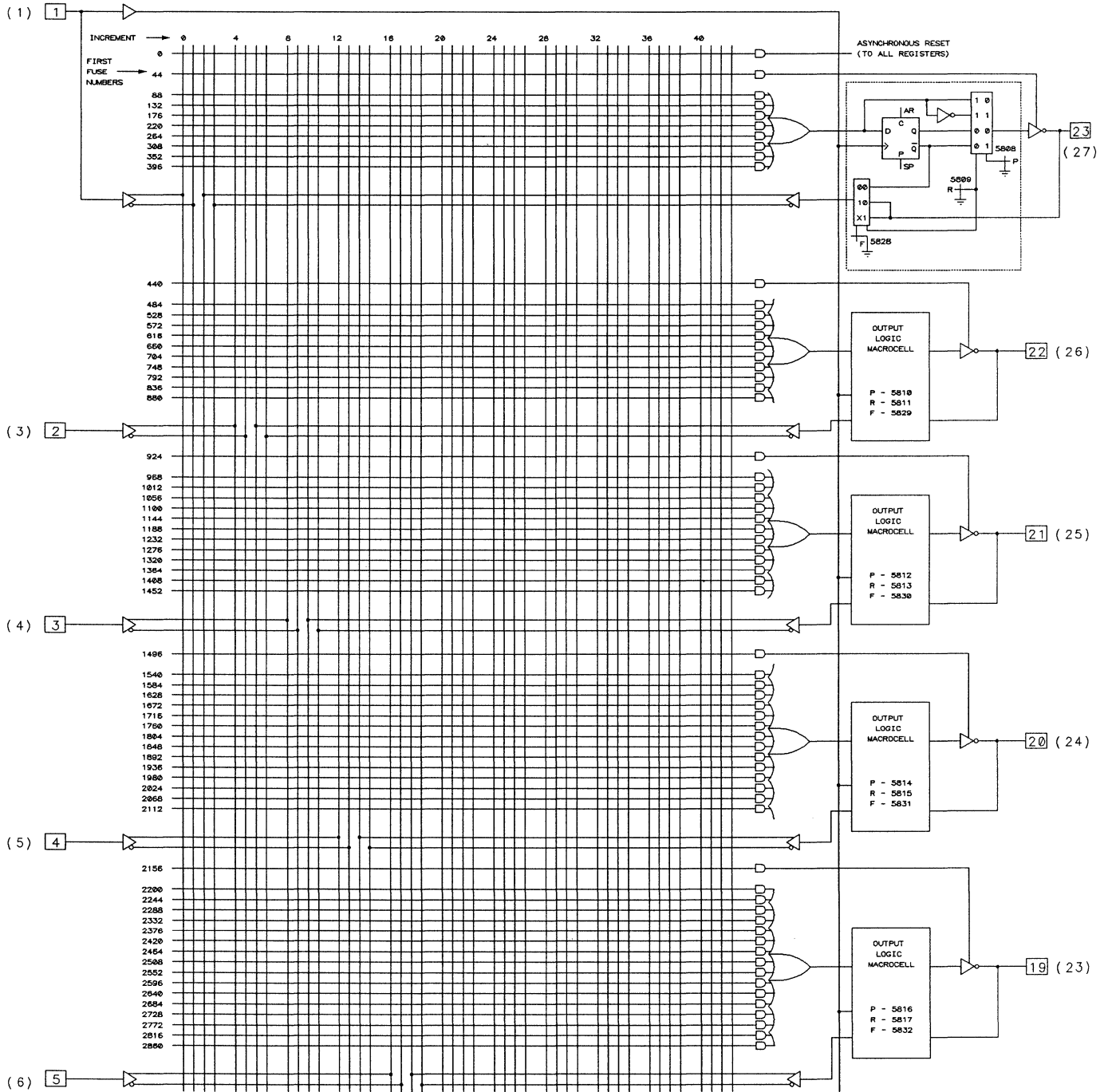
Data I/O Corporation



NOTES:

1. INSIDE EACH MACROCELL, THE "P" FUSE NUMBER IS THE POLARITY FUSE, AND THE "R" FUSE IS THE REGISTER FUSE.
2. FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

(16) = PIN NOS. FOR PLCC "NL" PACKAGE

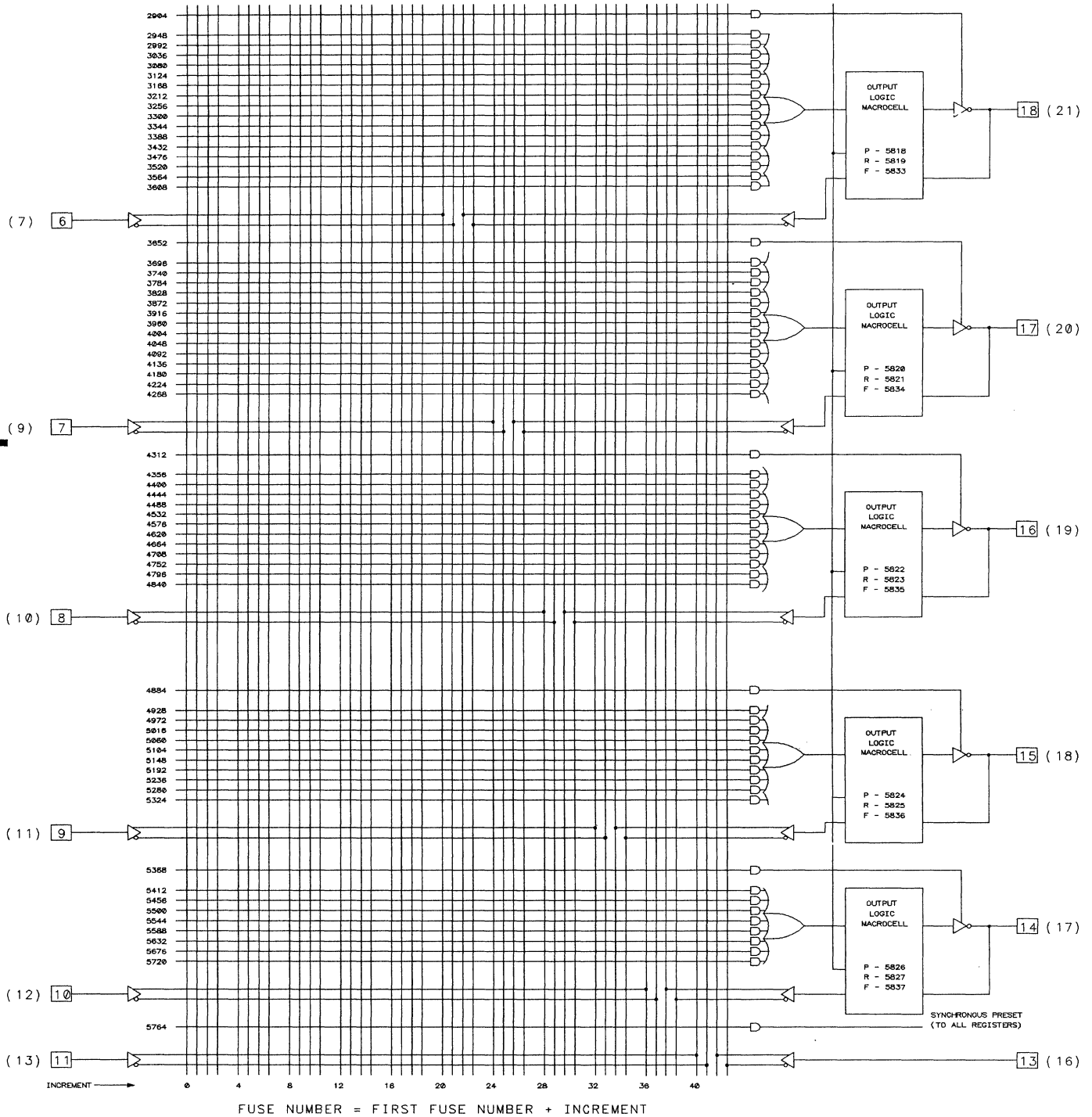


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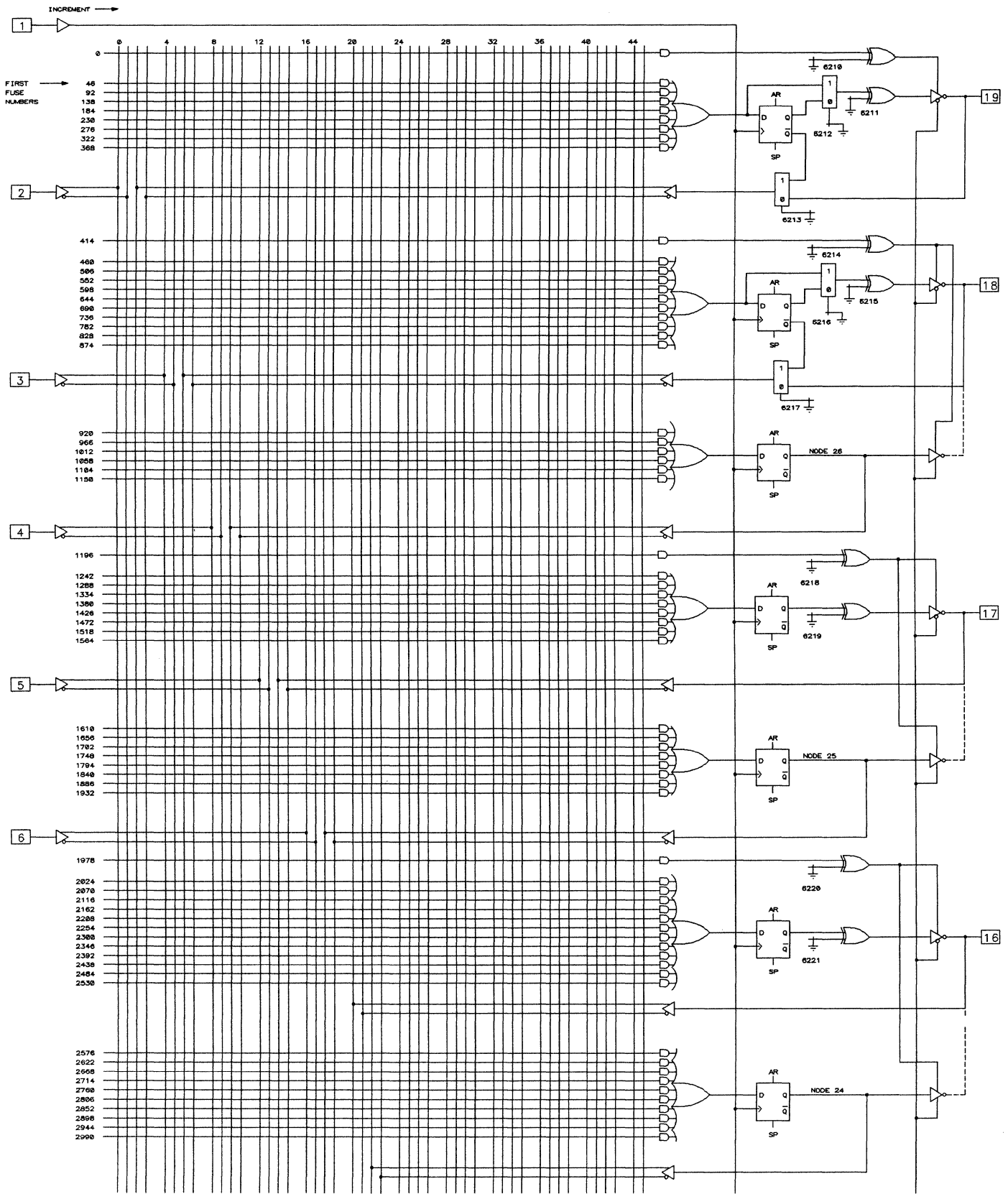


Corporation

Data I/O



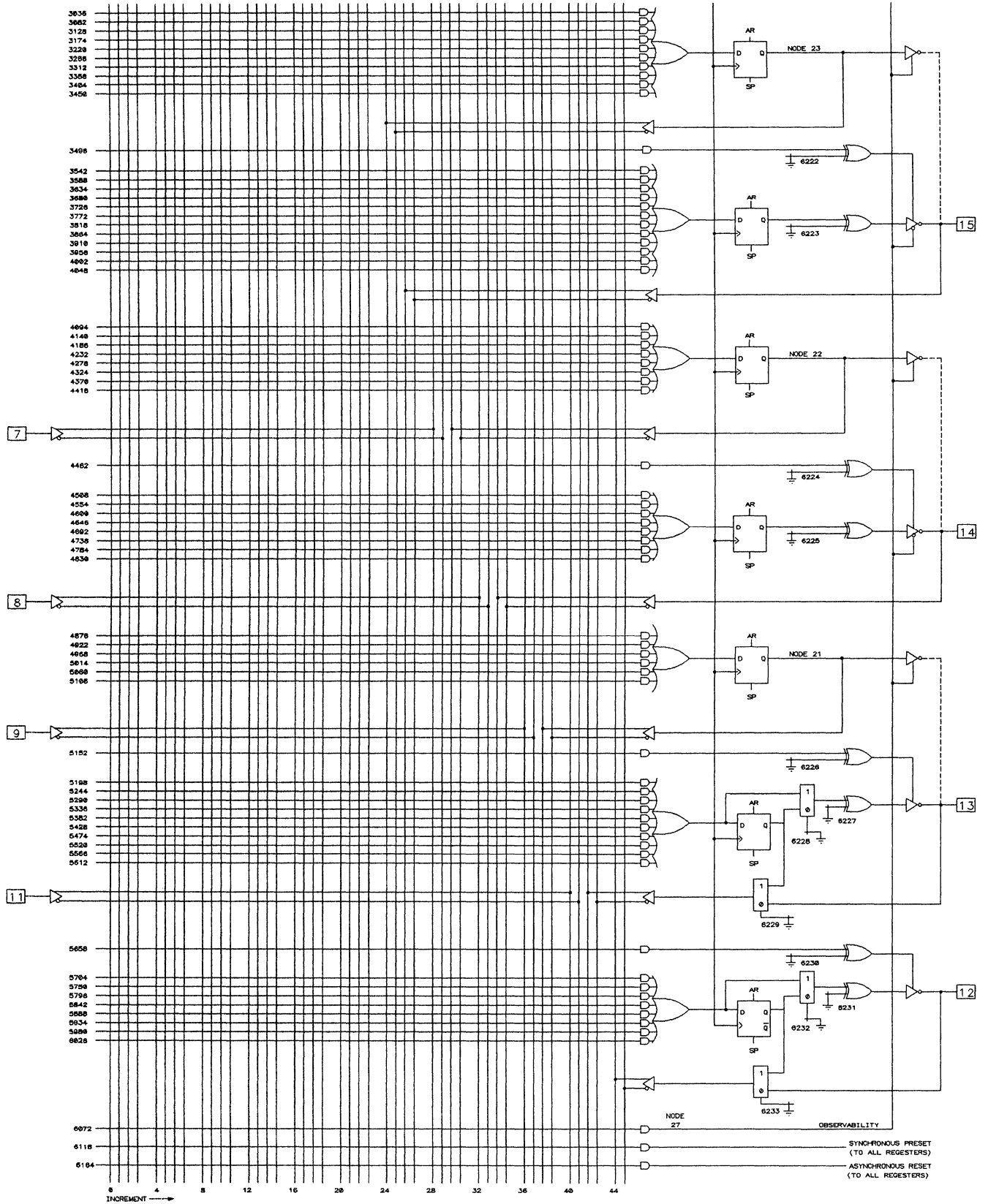
(16) = PIN NOS. FOR PLCC "NL" PACKAGE

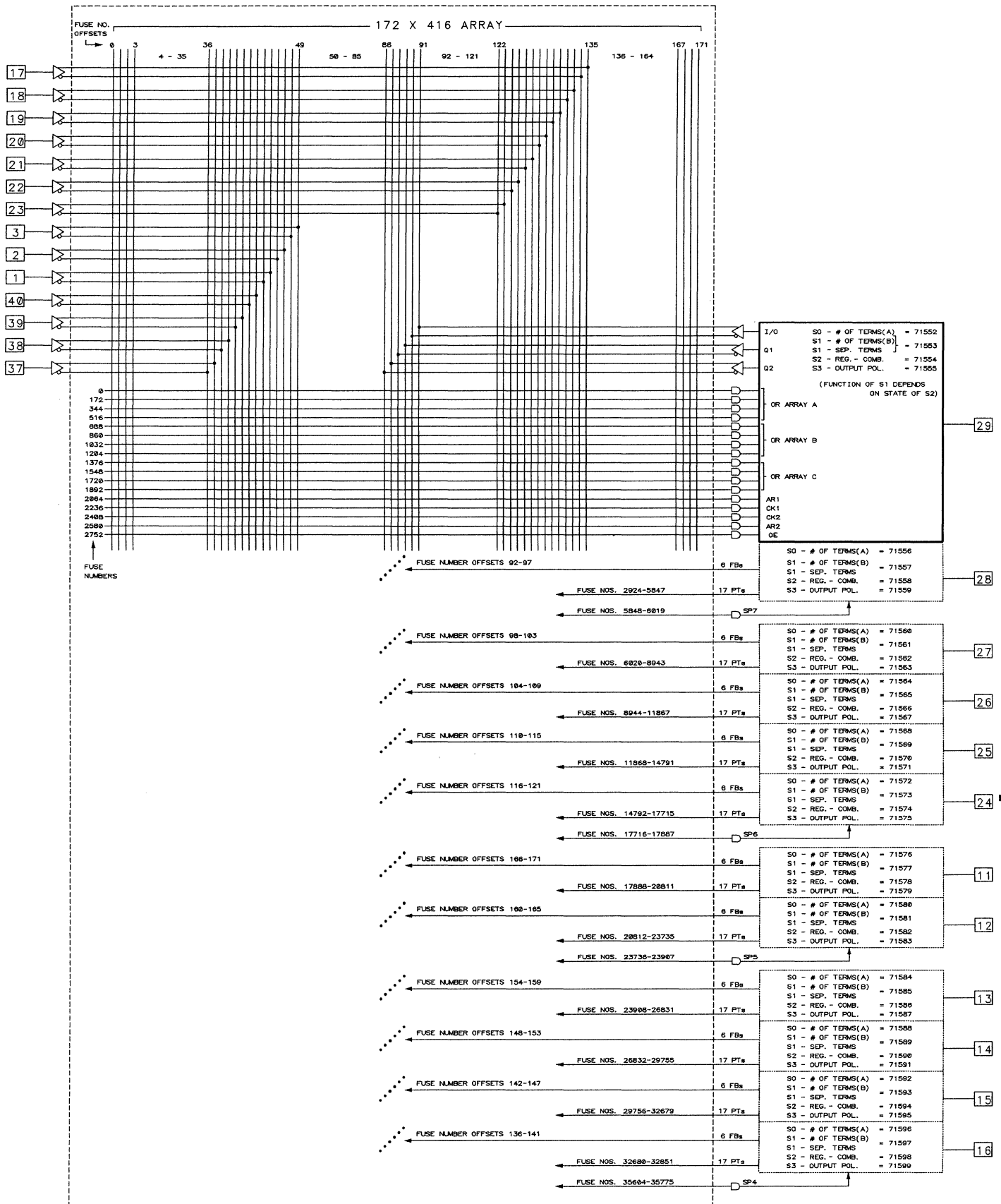


Data I/O Corporation

Corporation

Data I/O

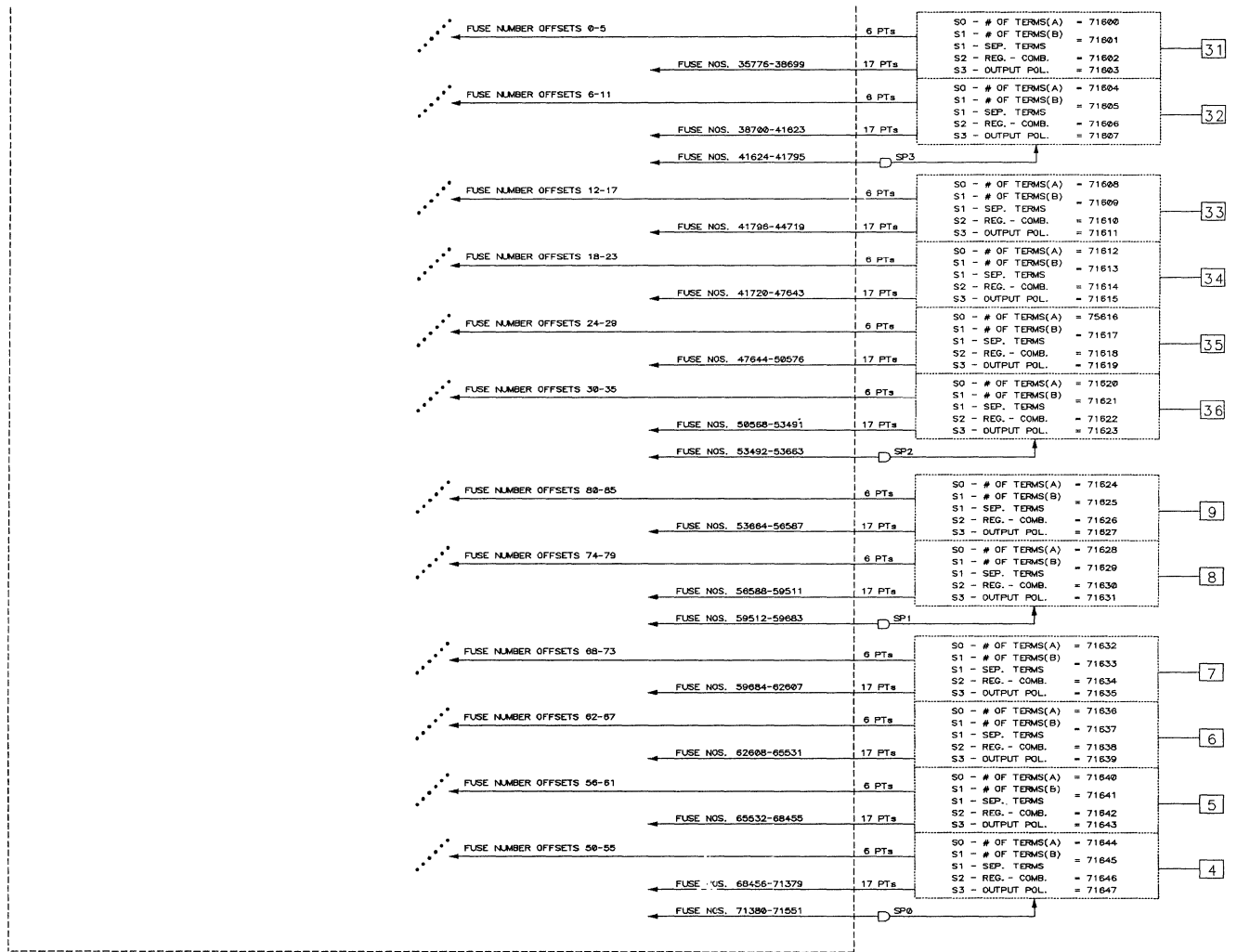


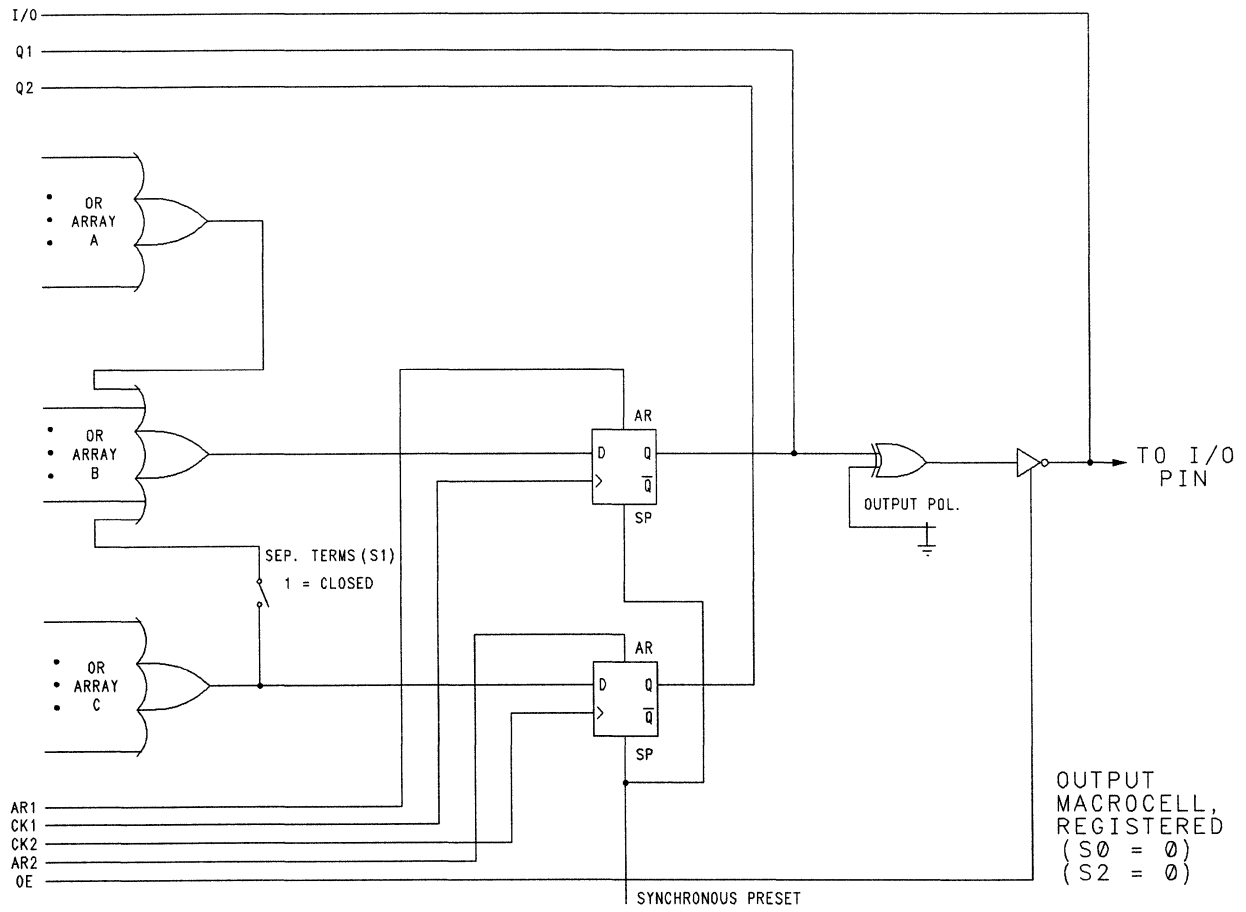


Data I/O

Corporation

Data I/O Corporation



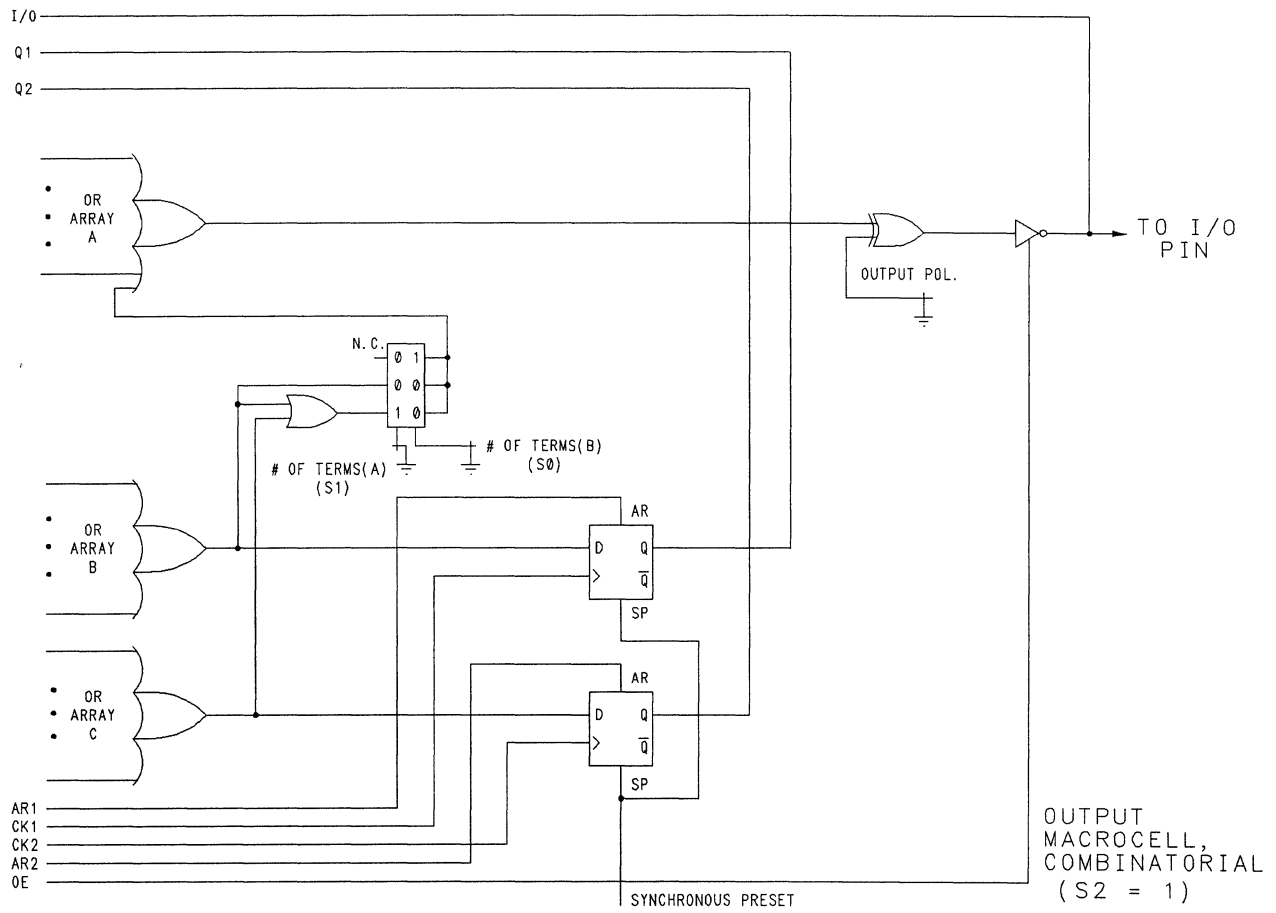


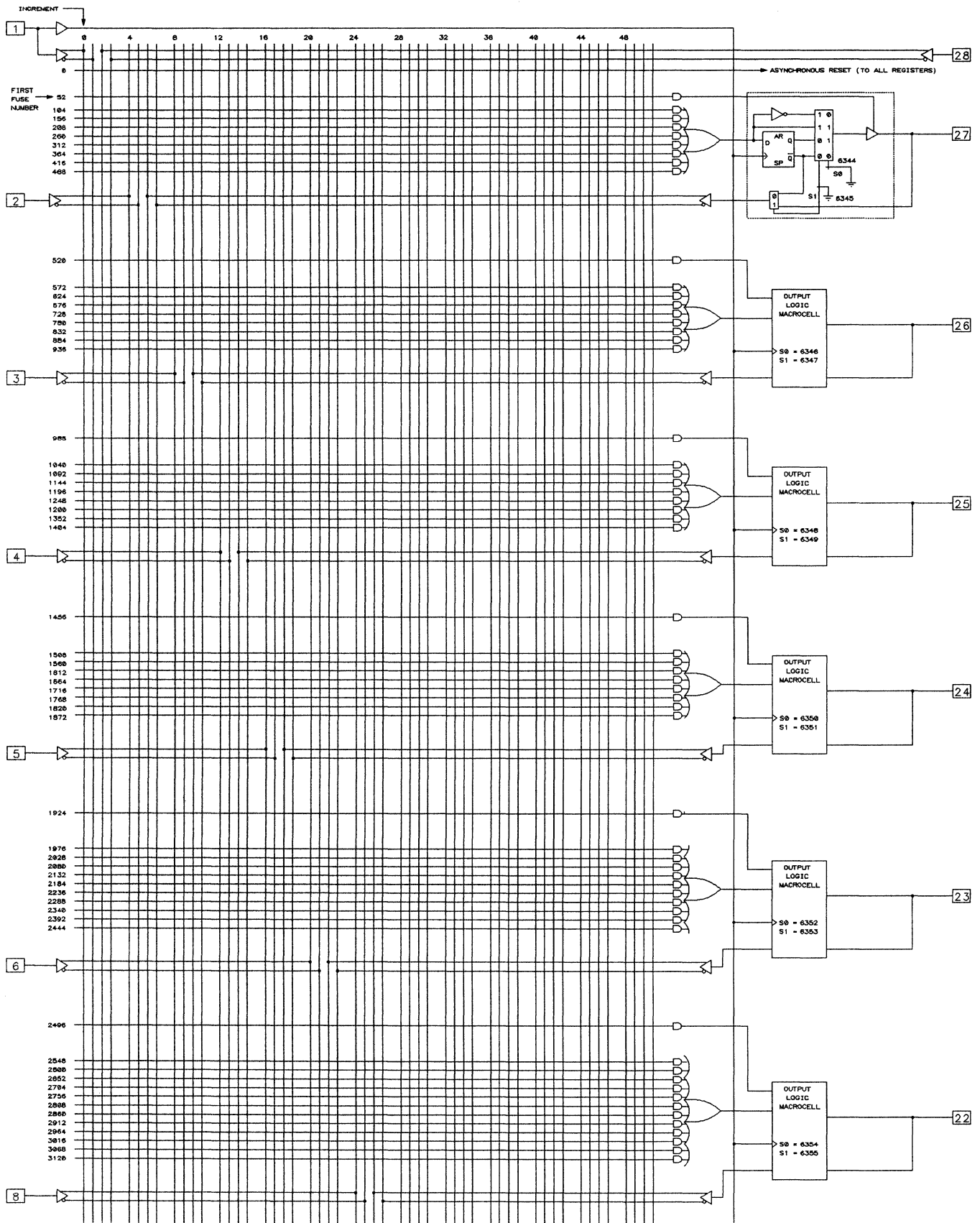
Data I/O

Corporation

Corporation

Data I/O

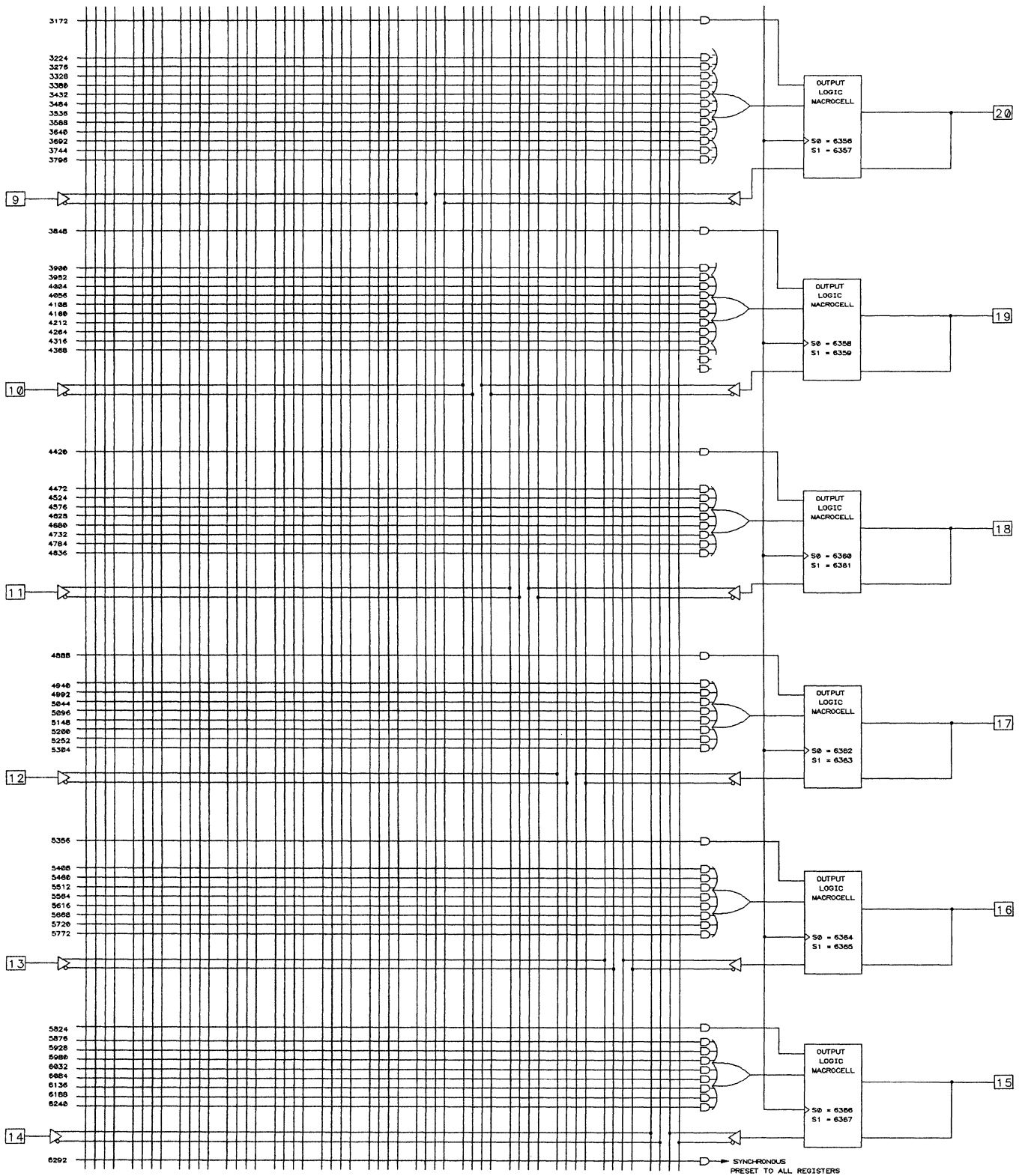


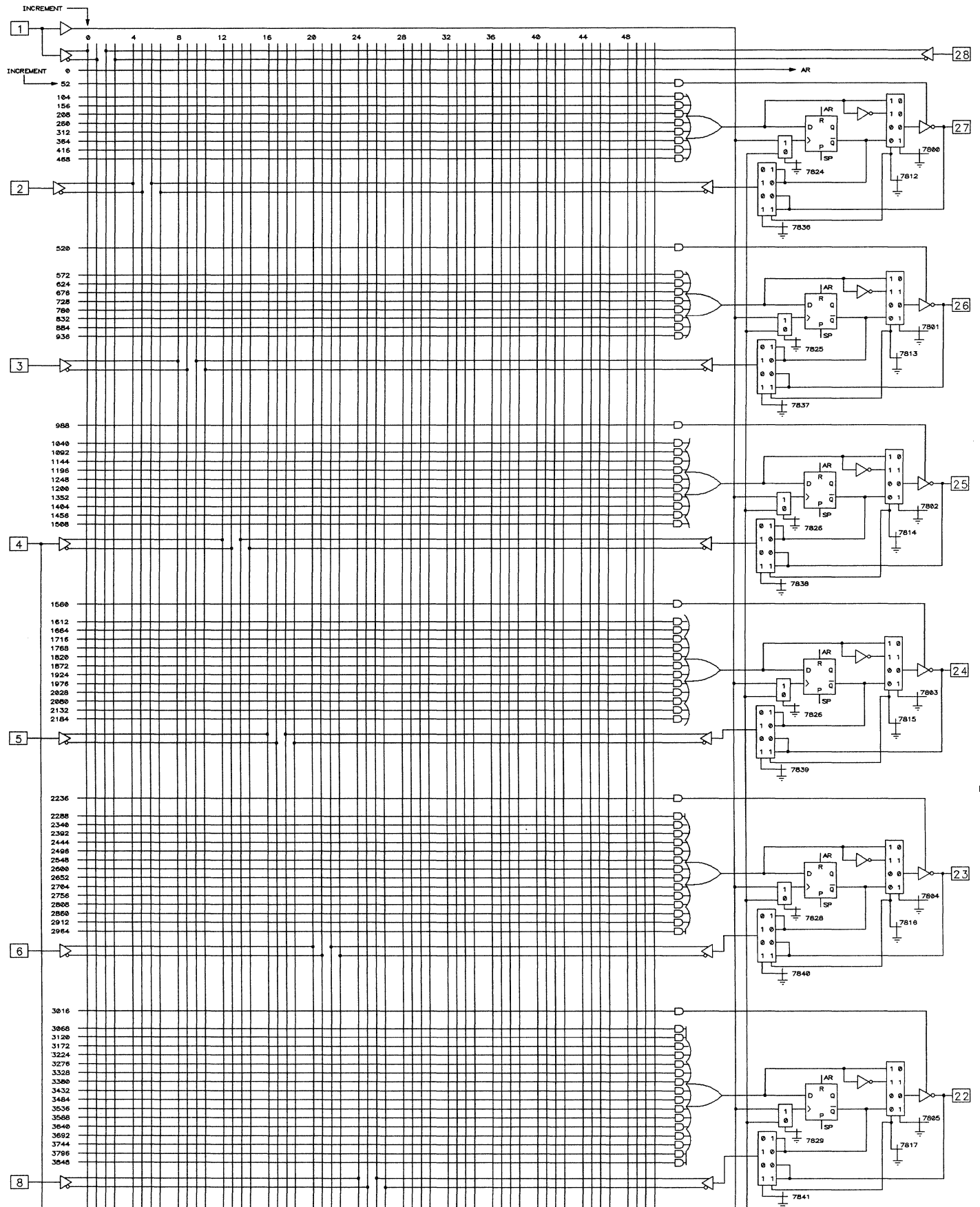


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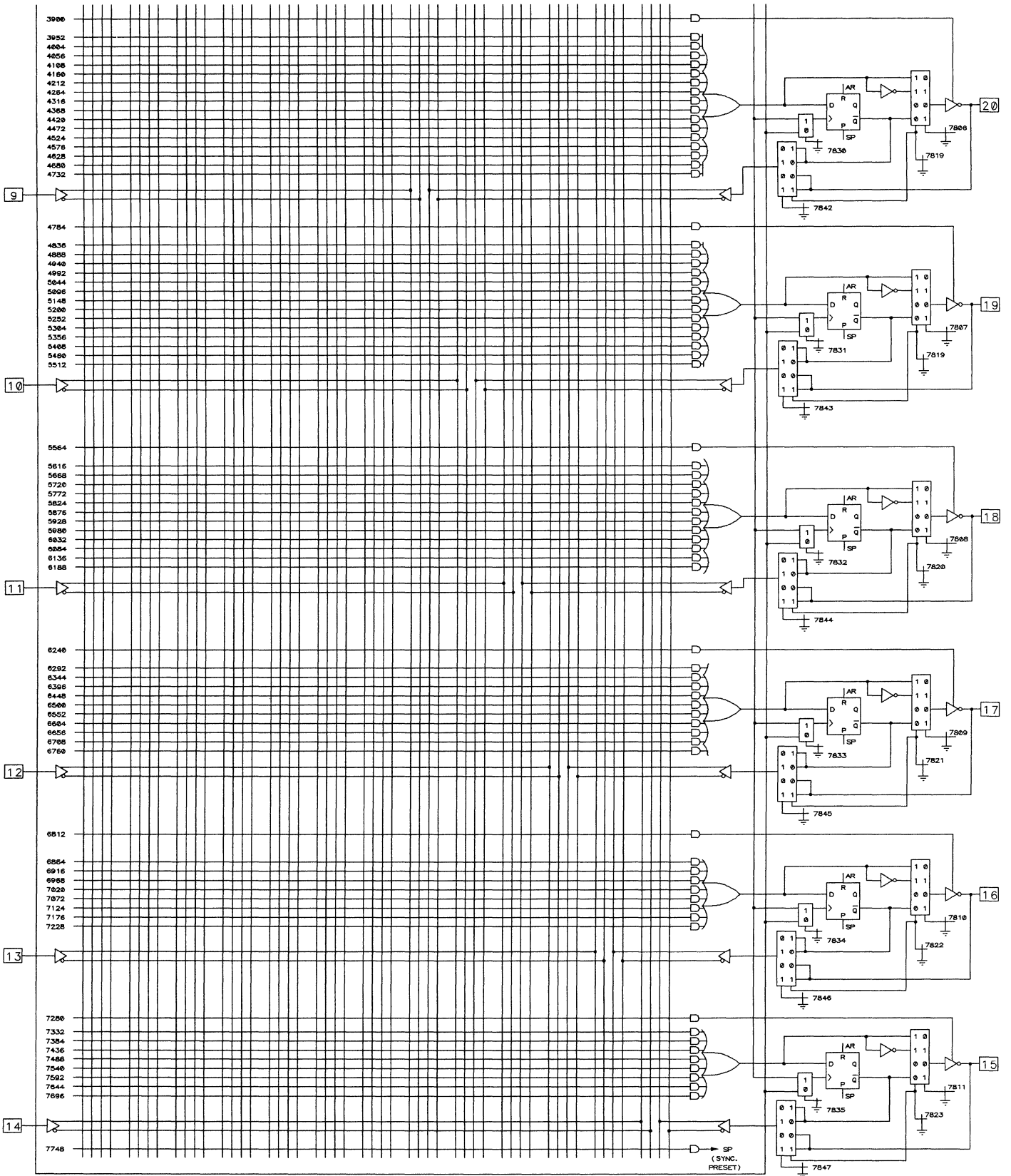
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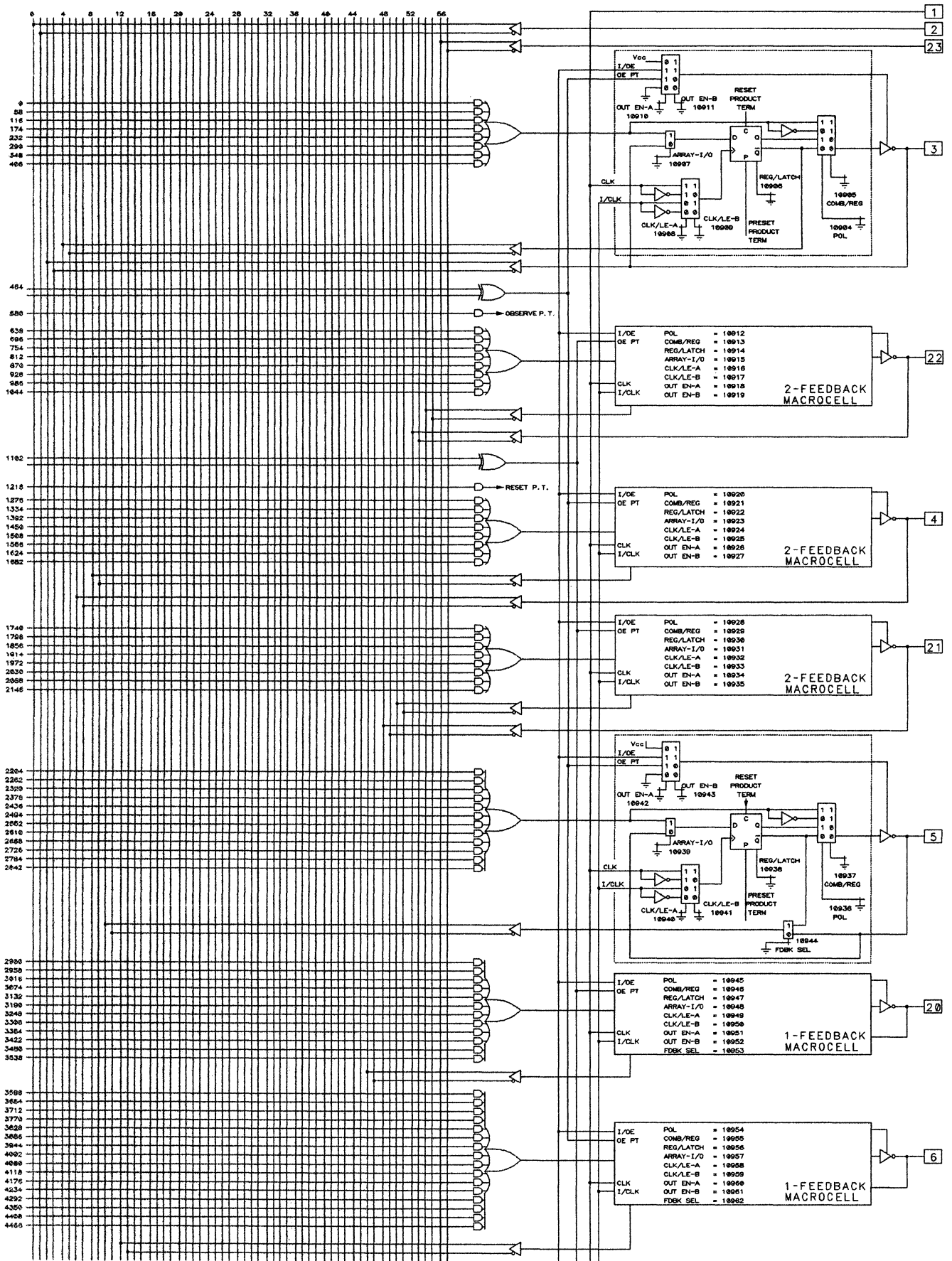




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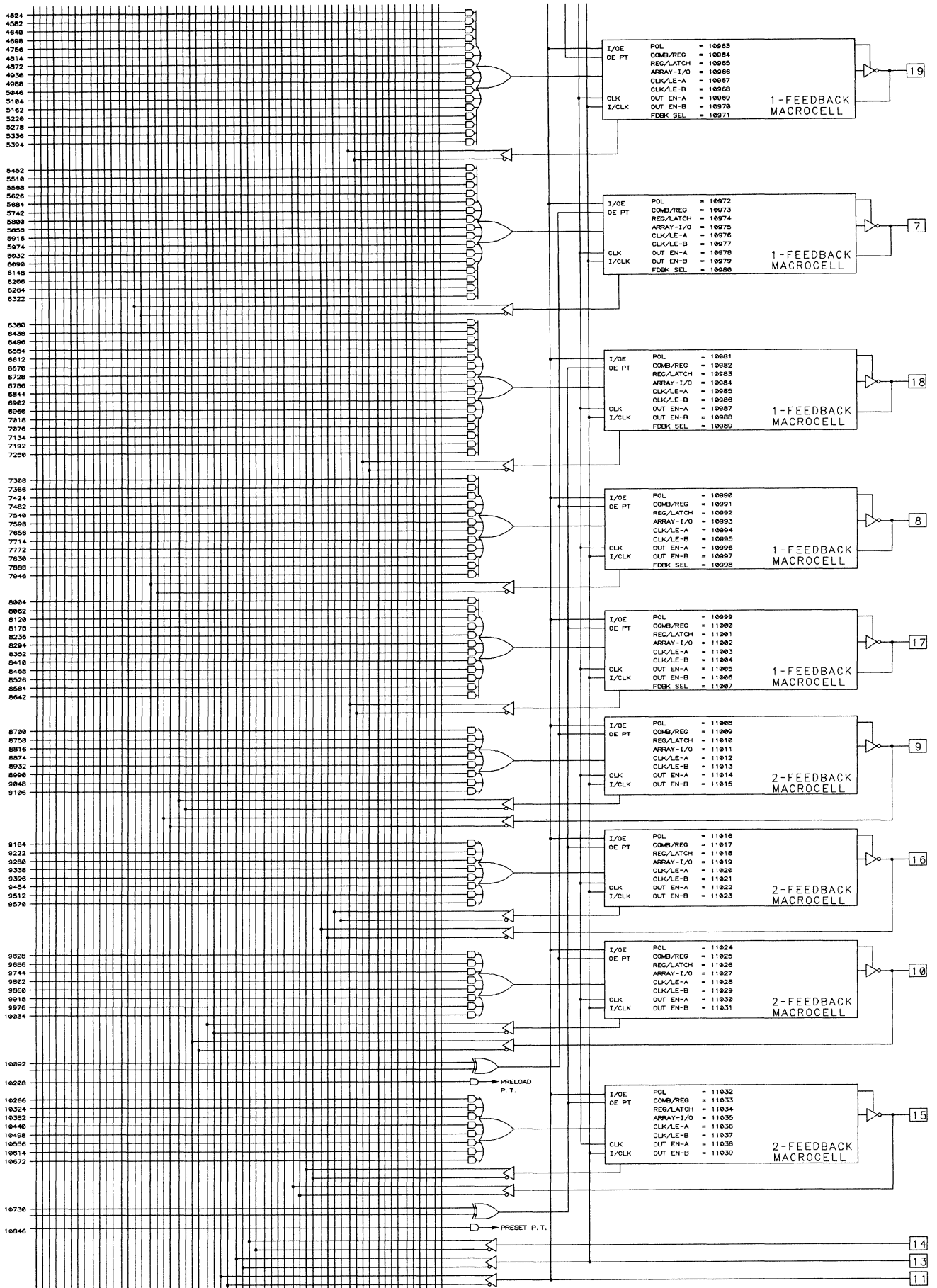
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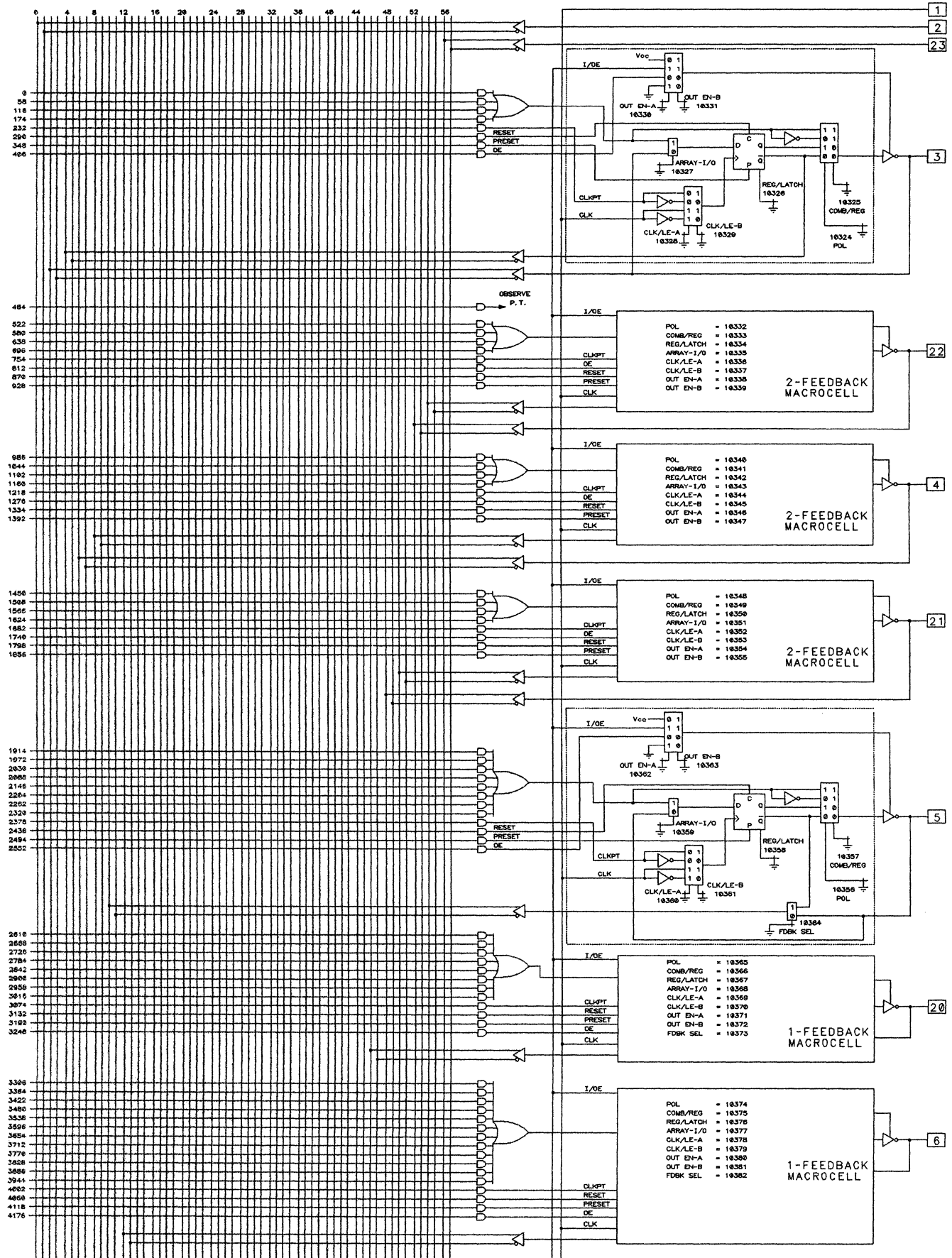




Data I/O Corporation

Corporation  
Data I/O

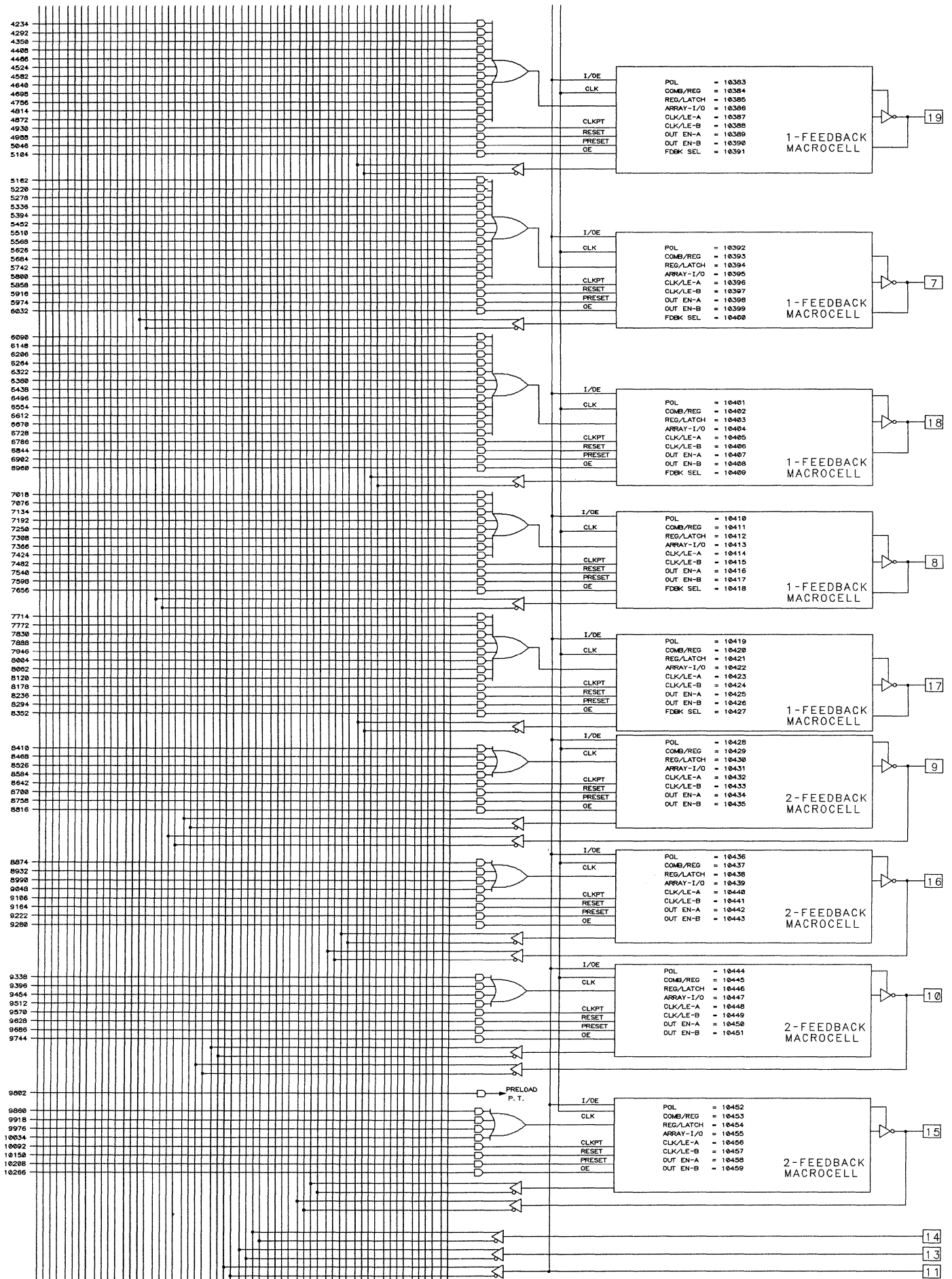


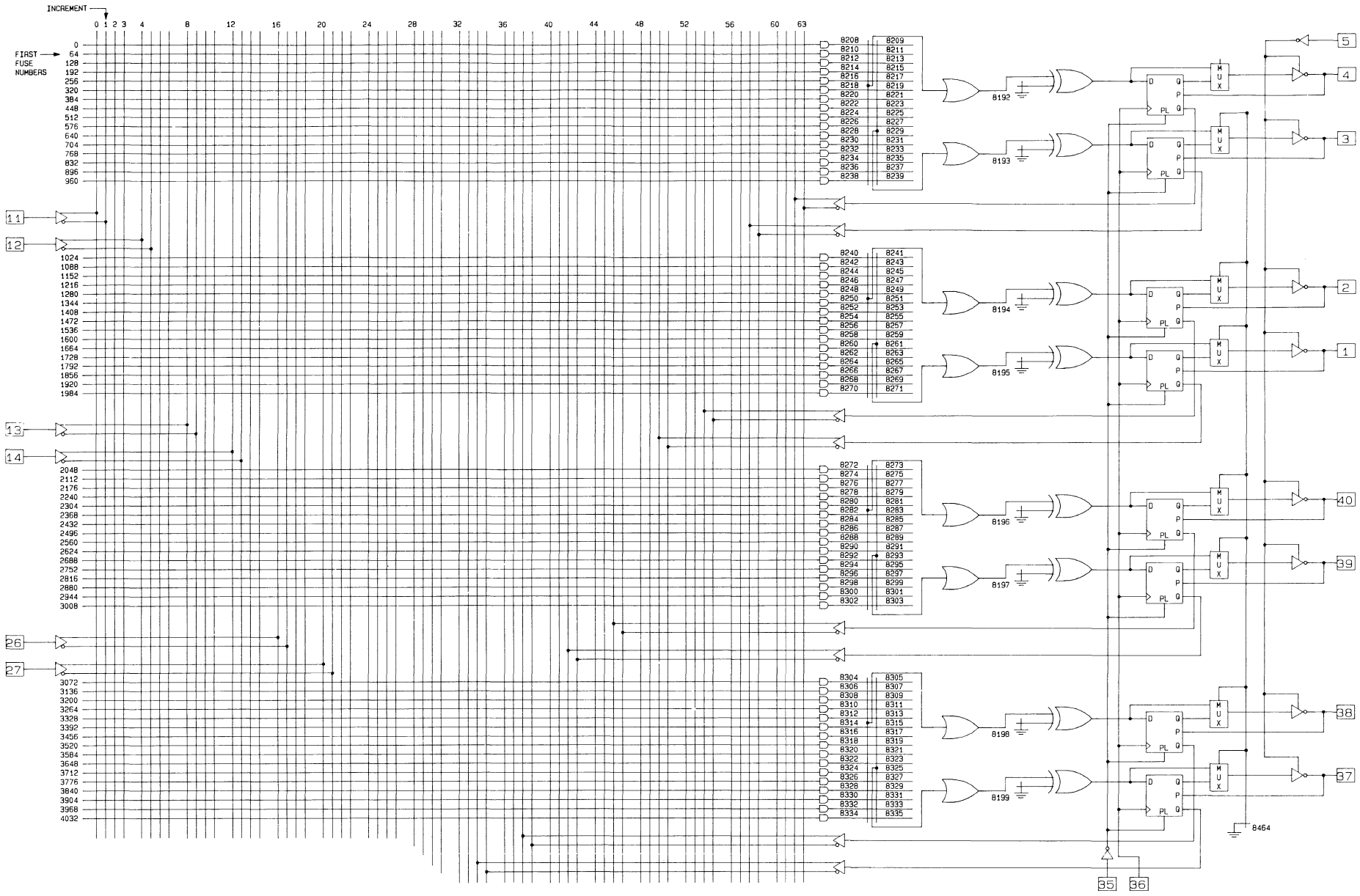


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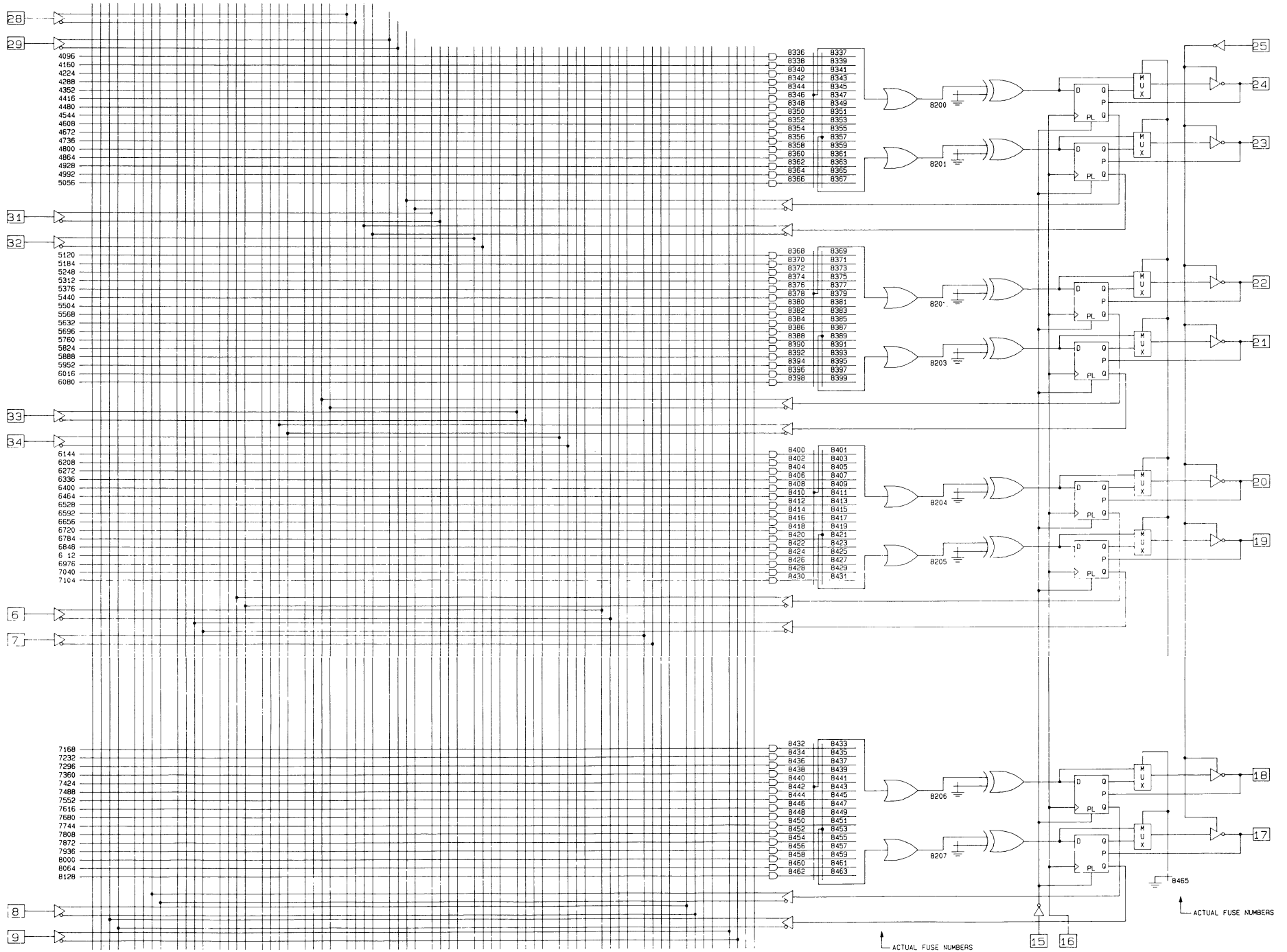
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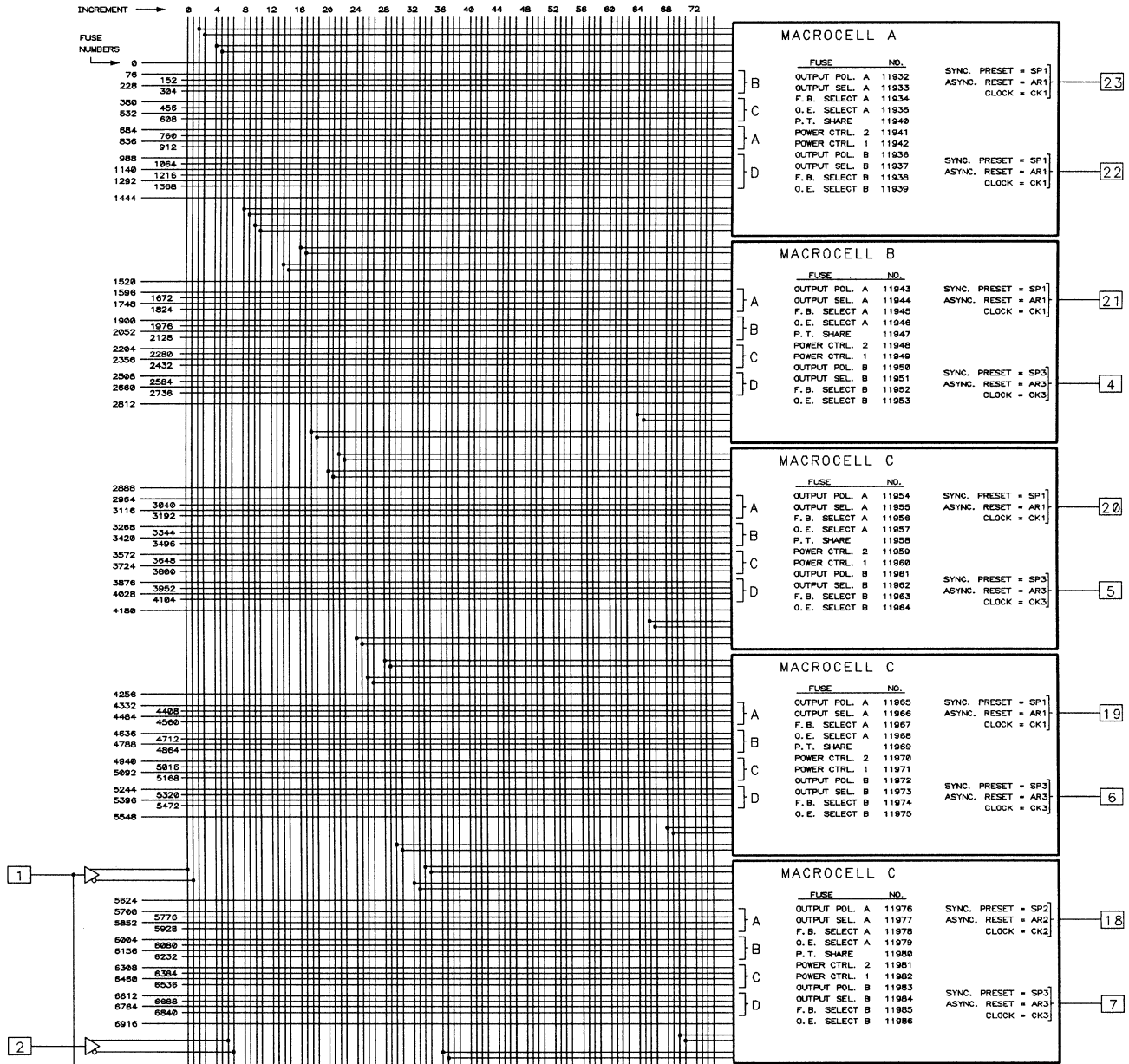


# Data I/O Corporation

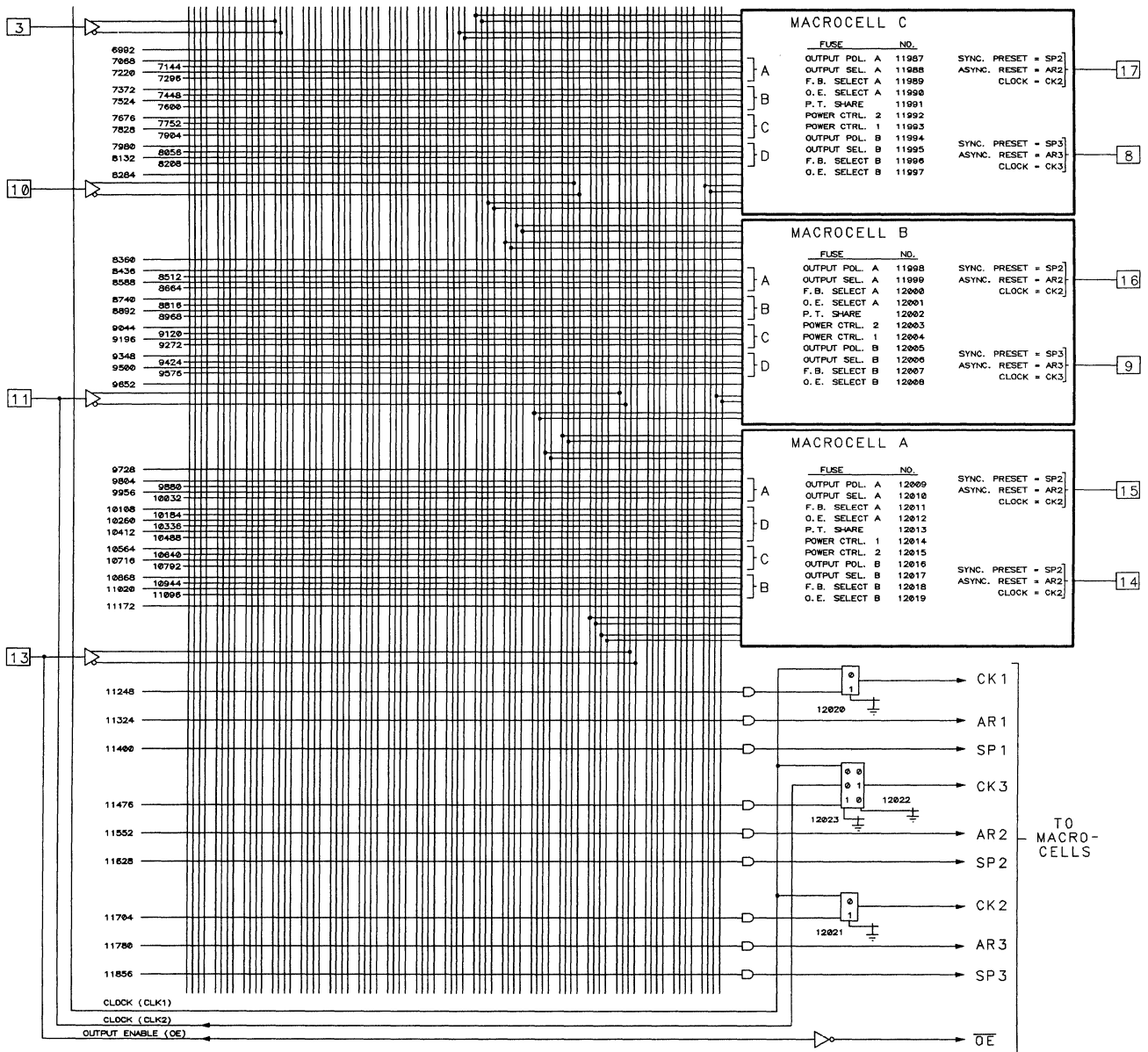


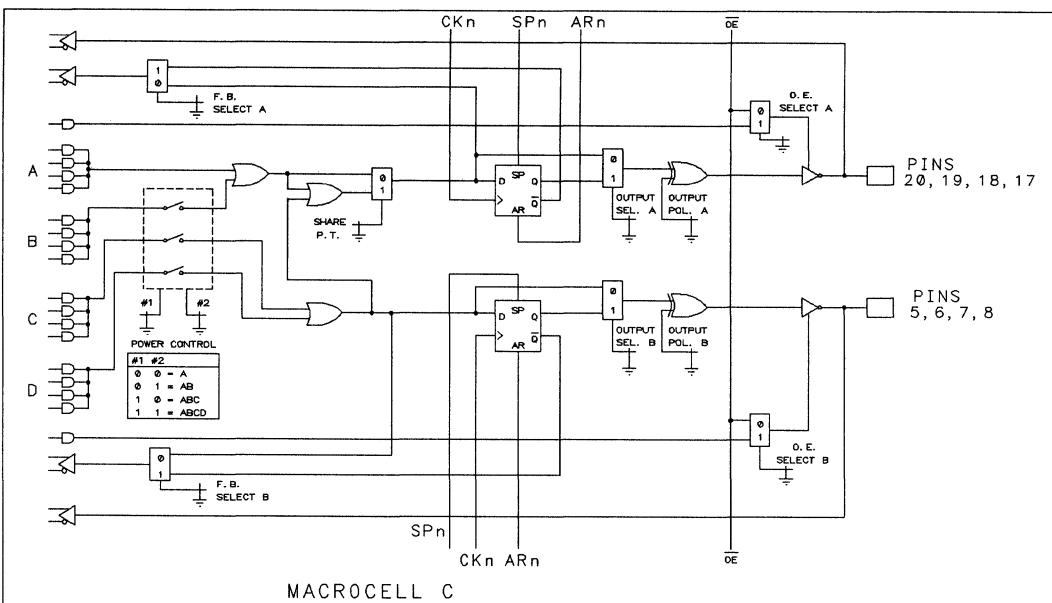
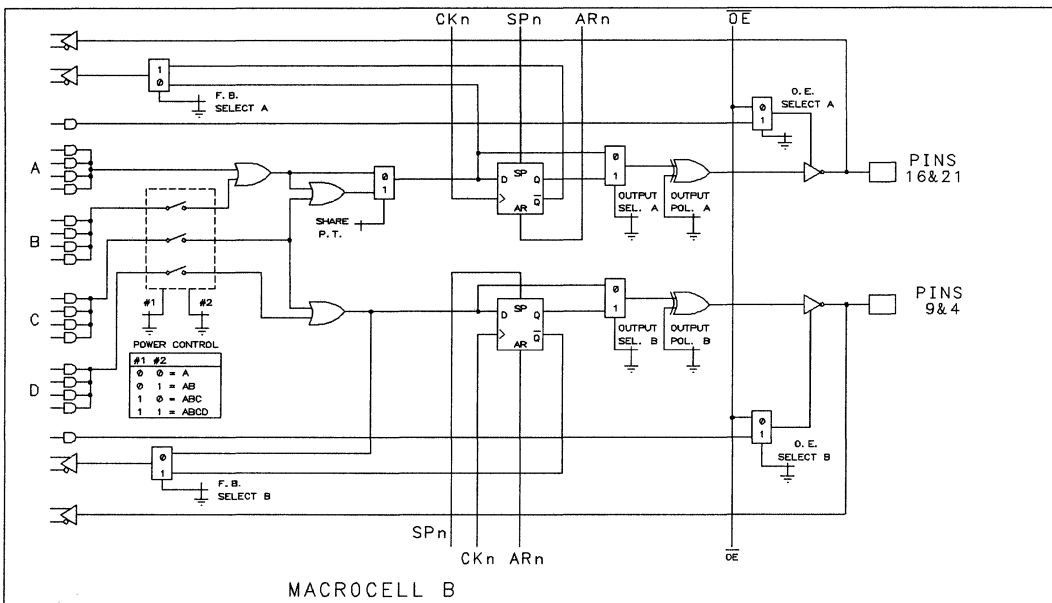
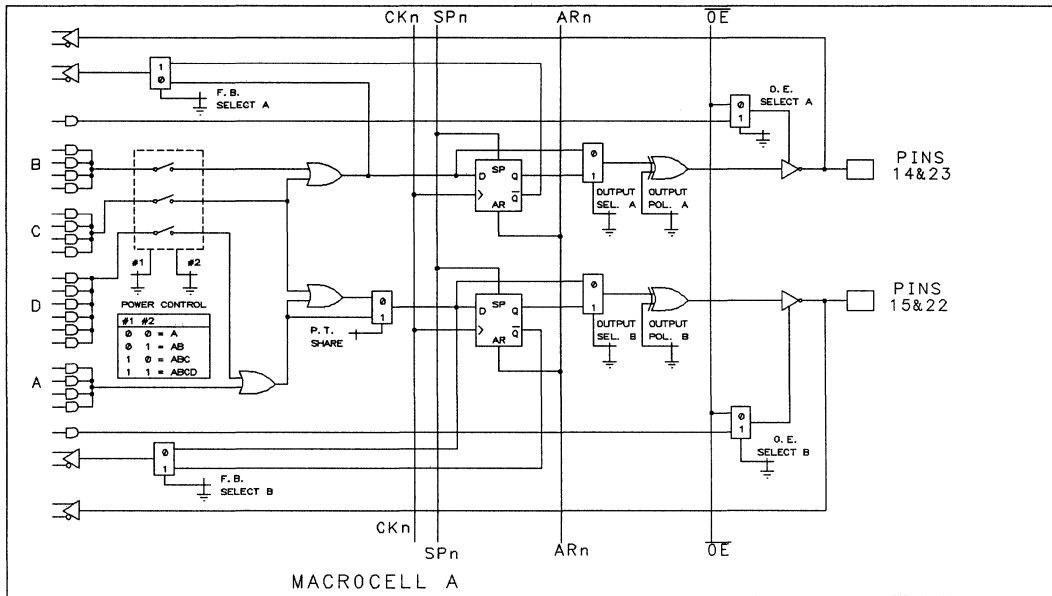


NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

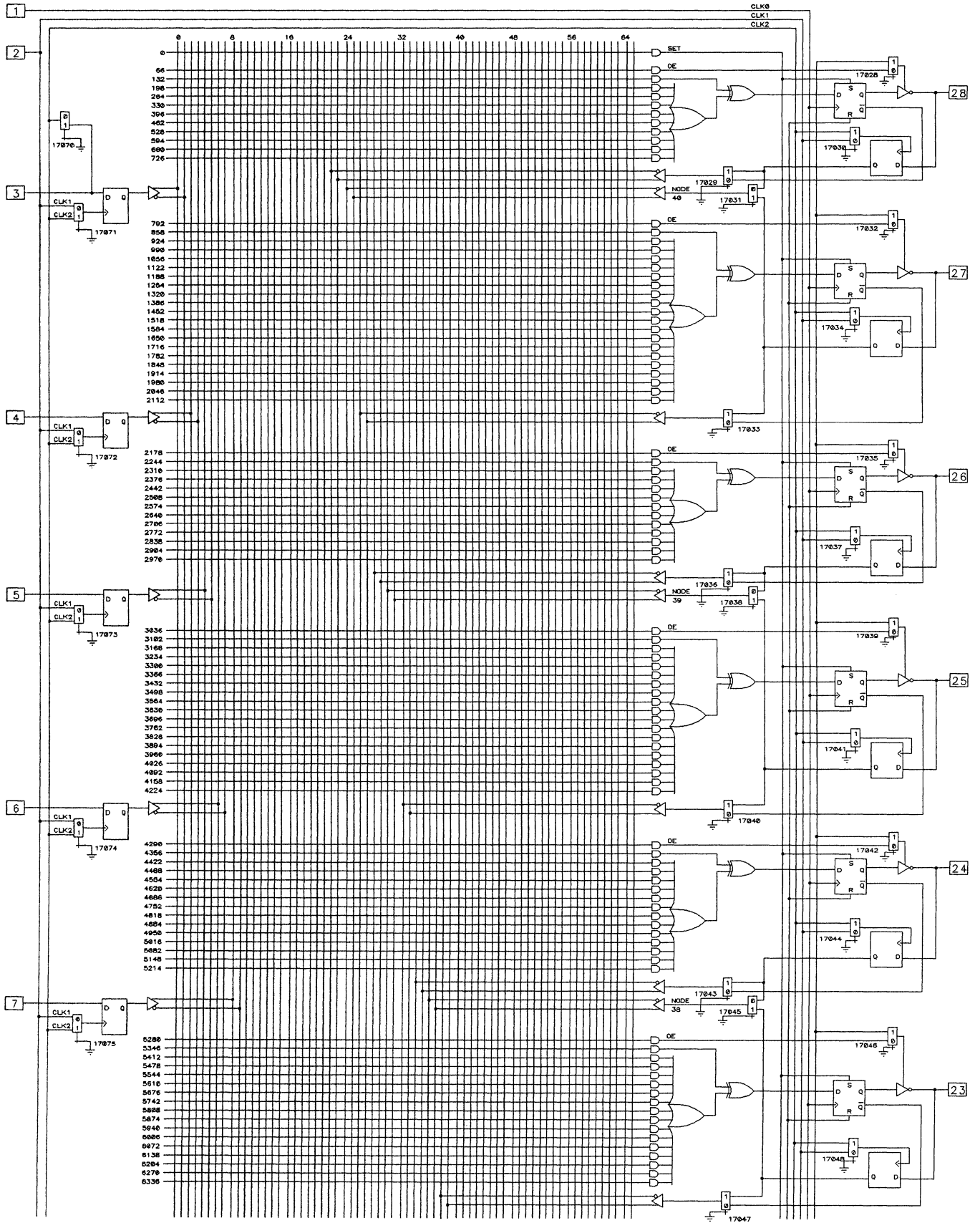


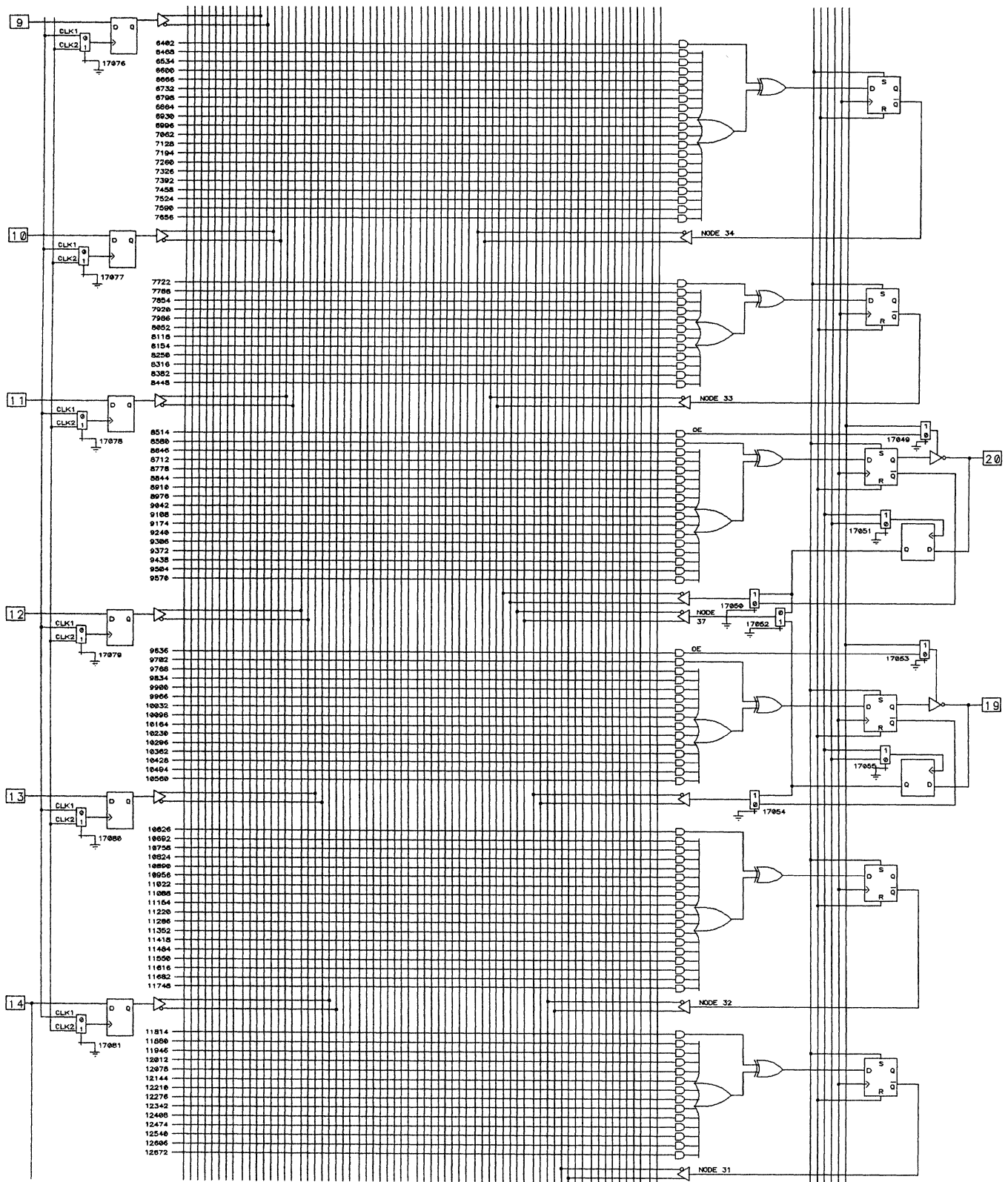
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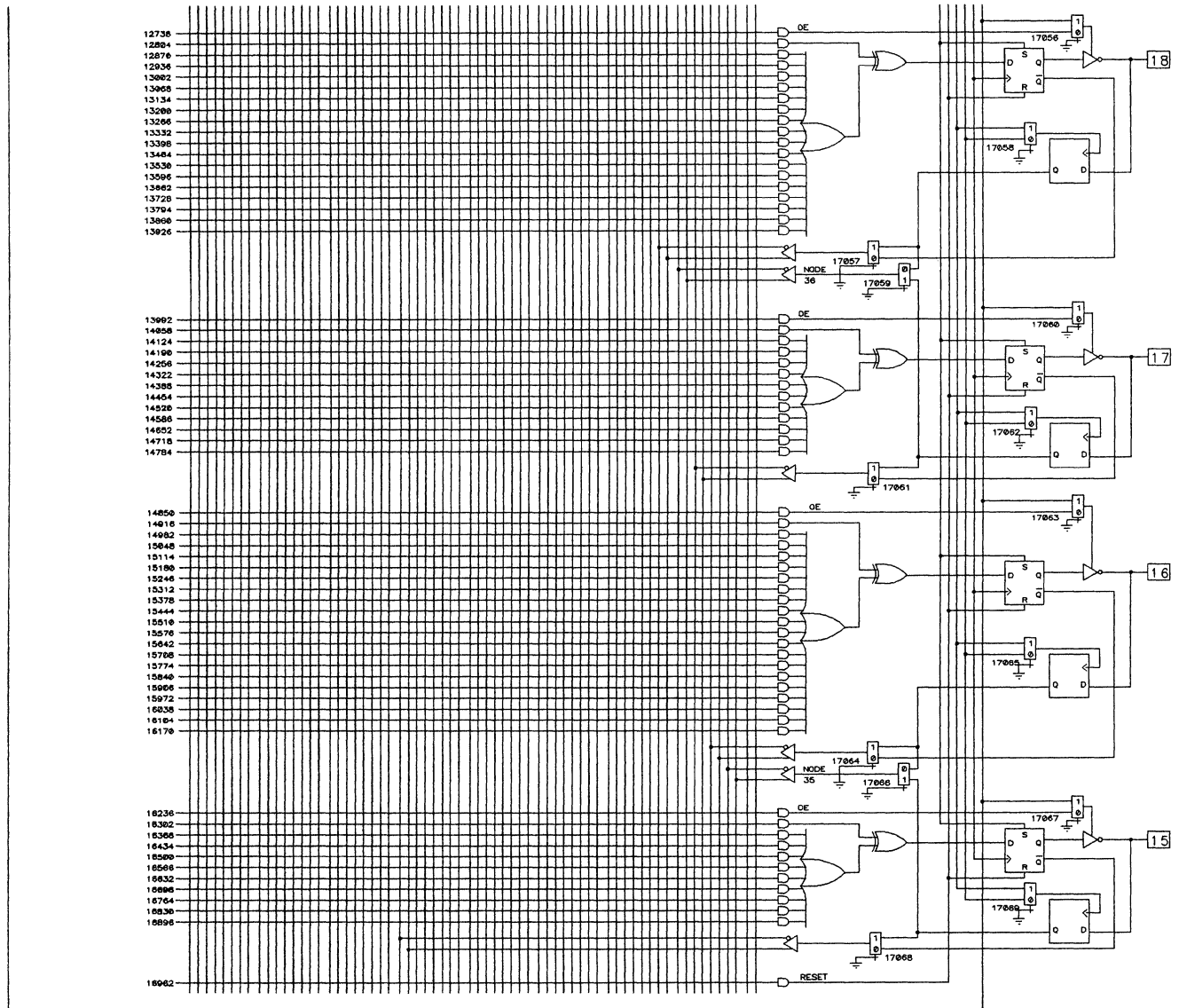
Corporation  
Data I/O

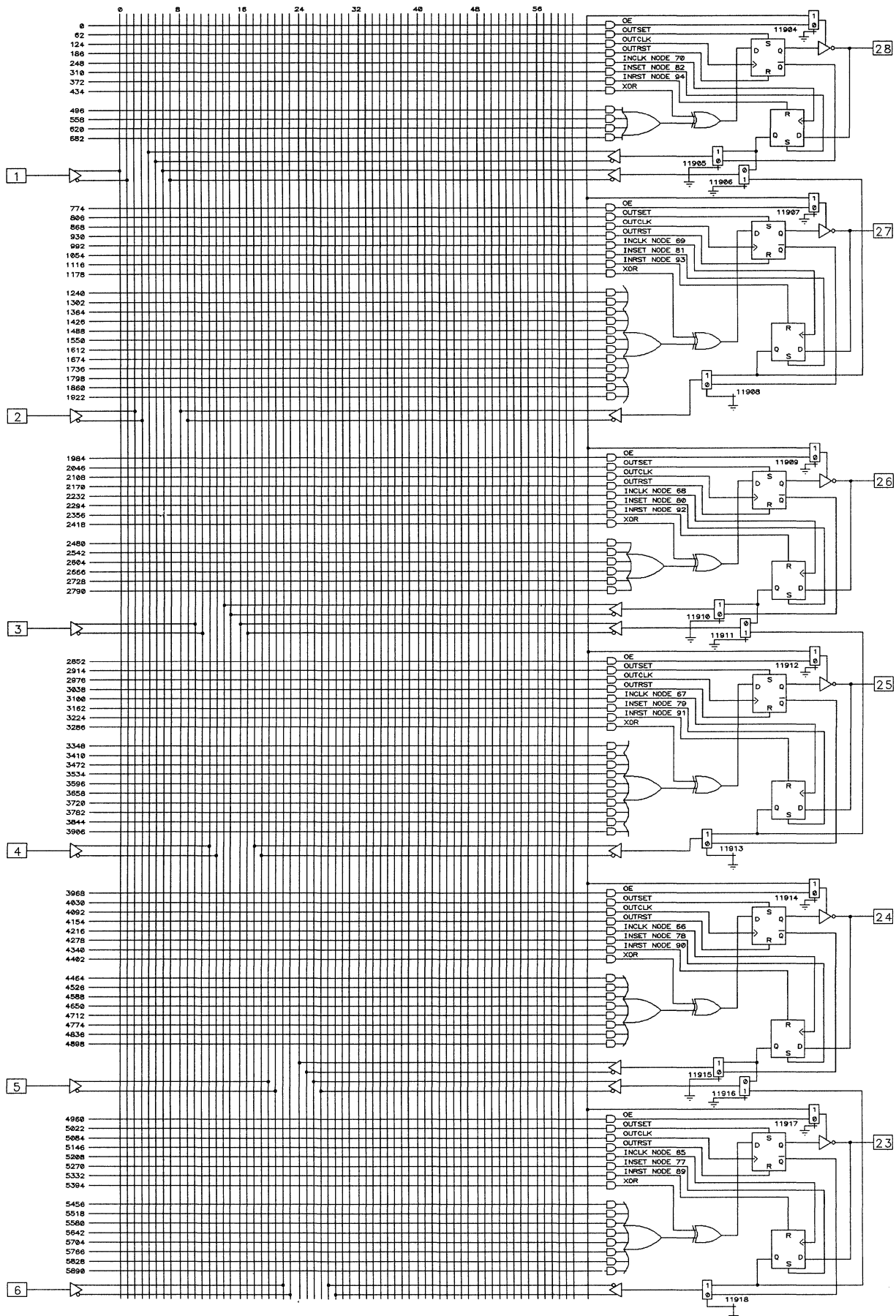




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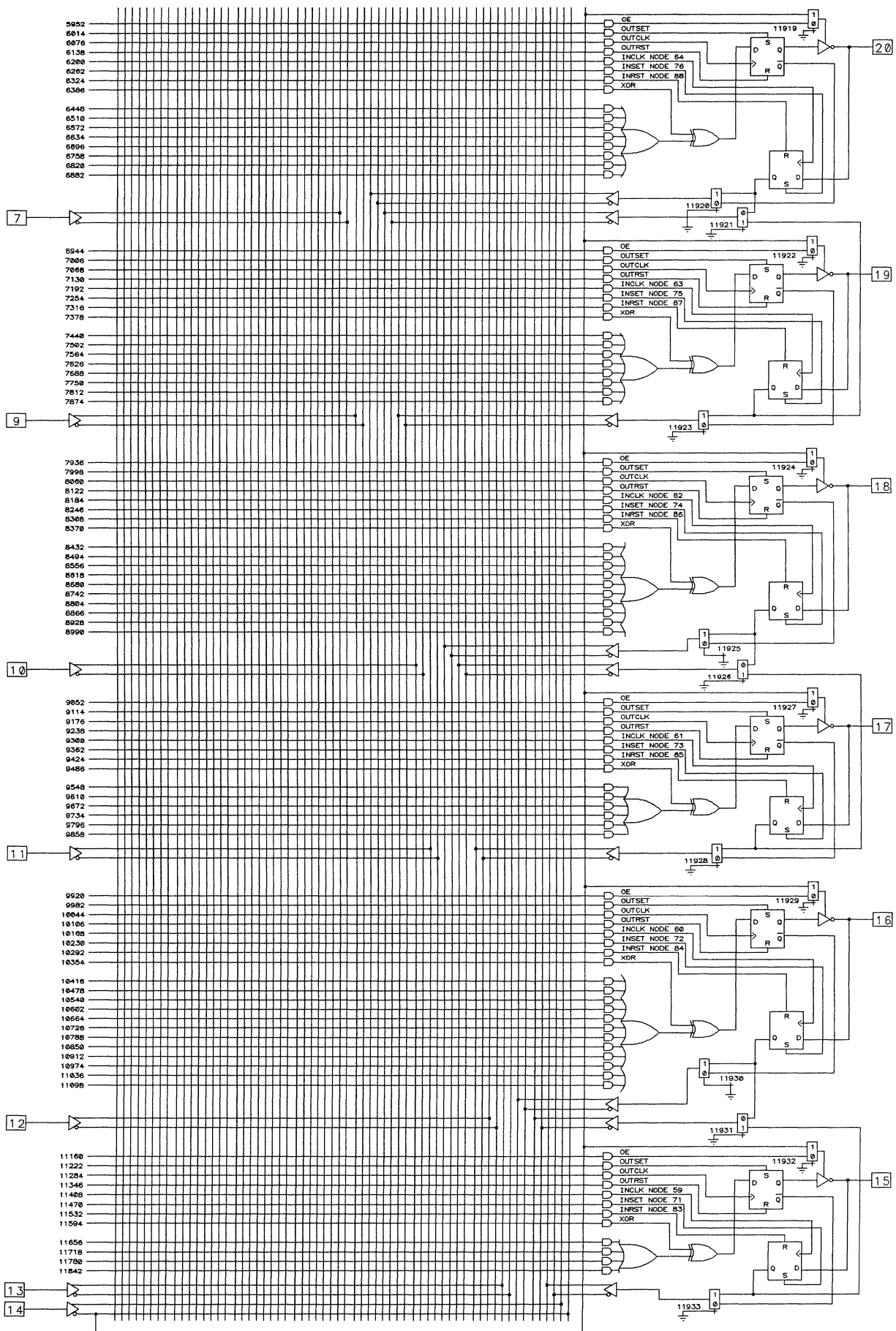
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**Data I/O**

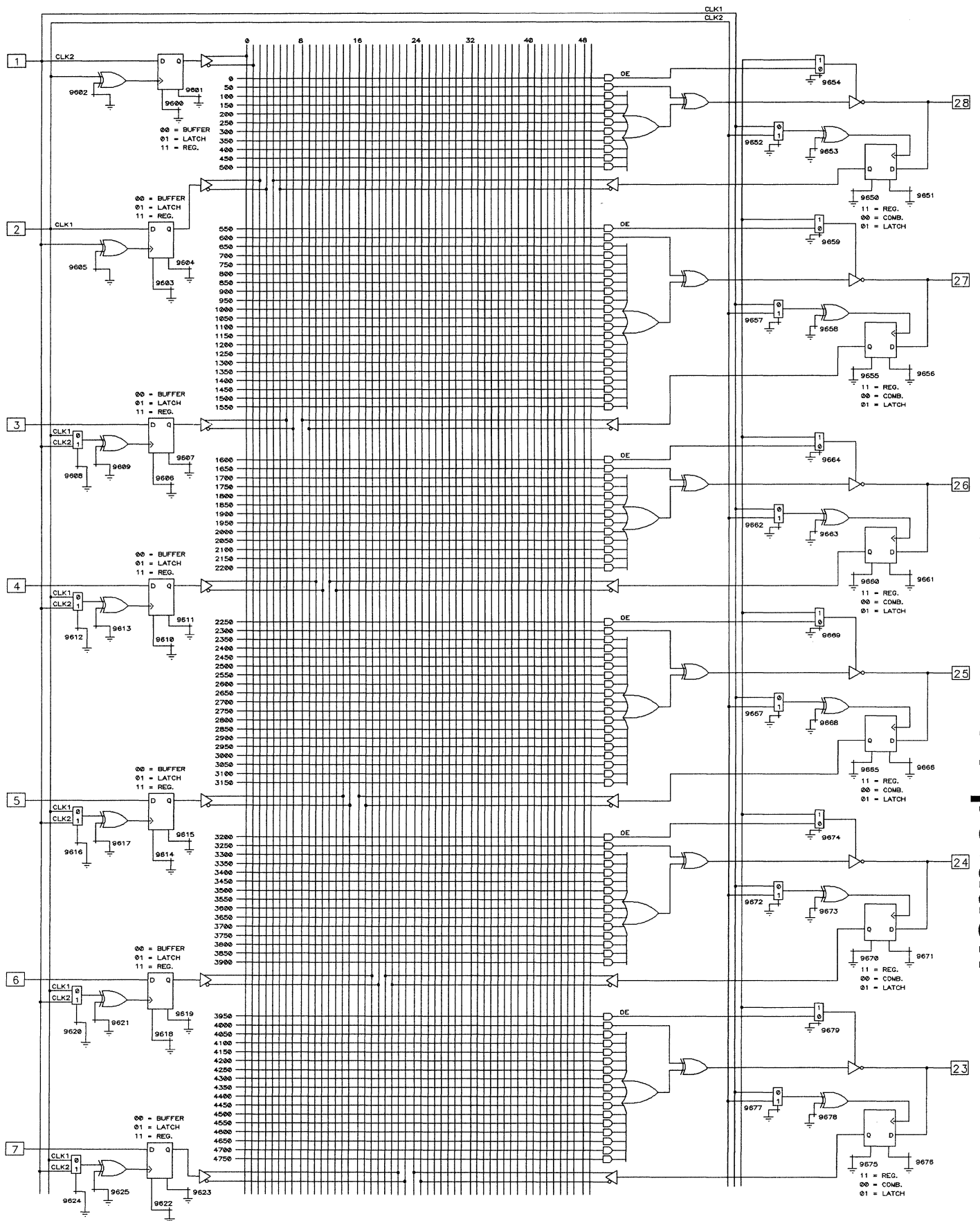






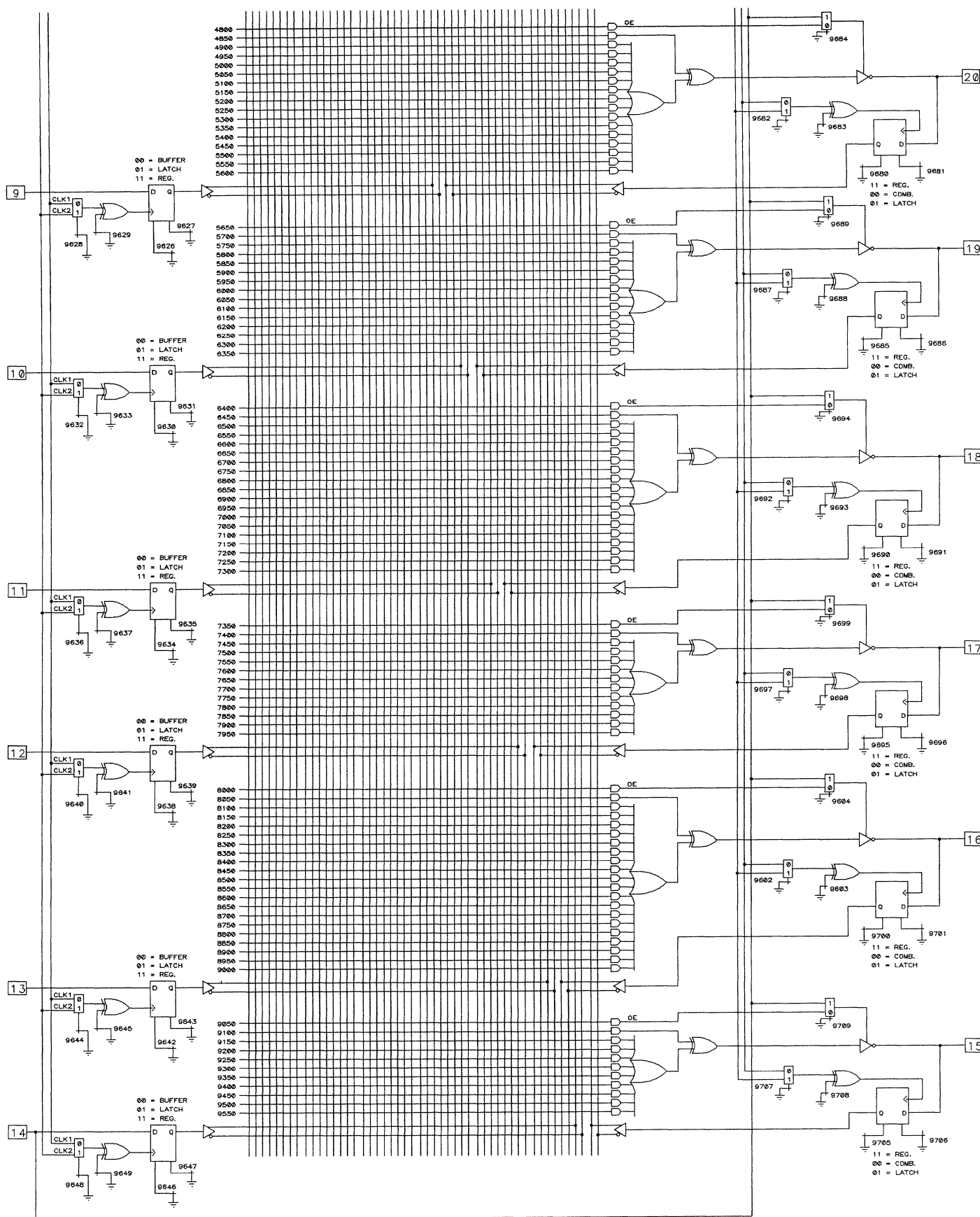
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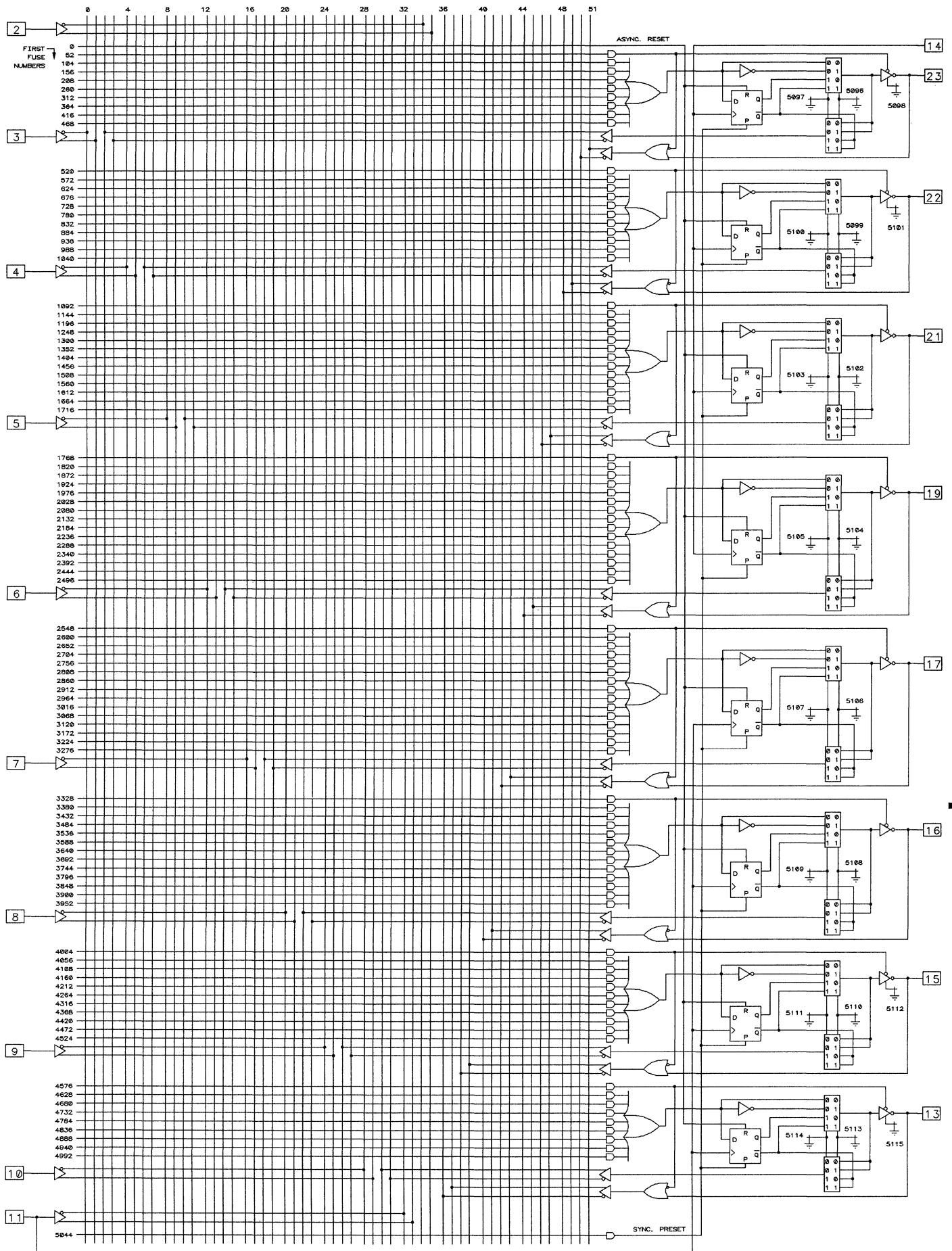




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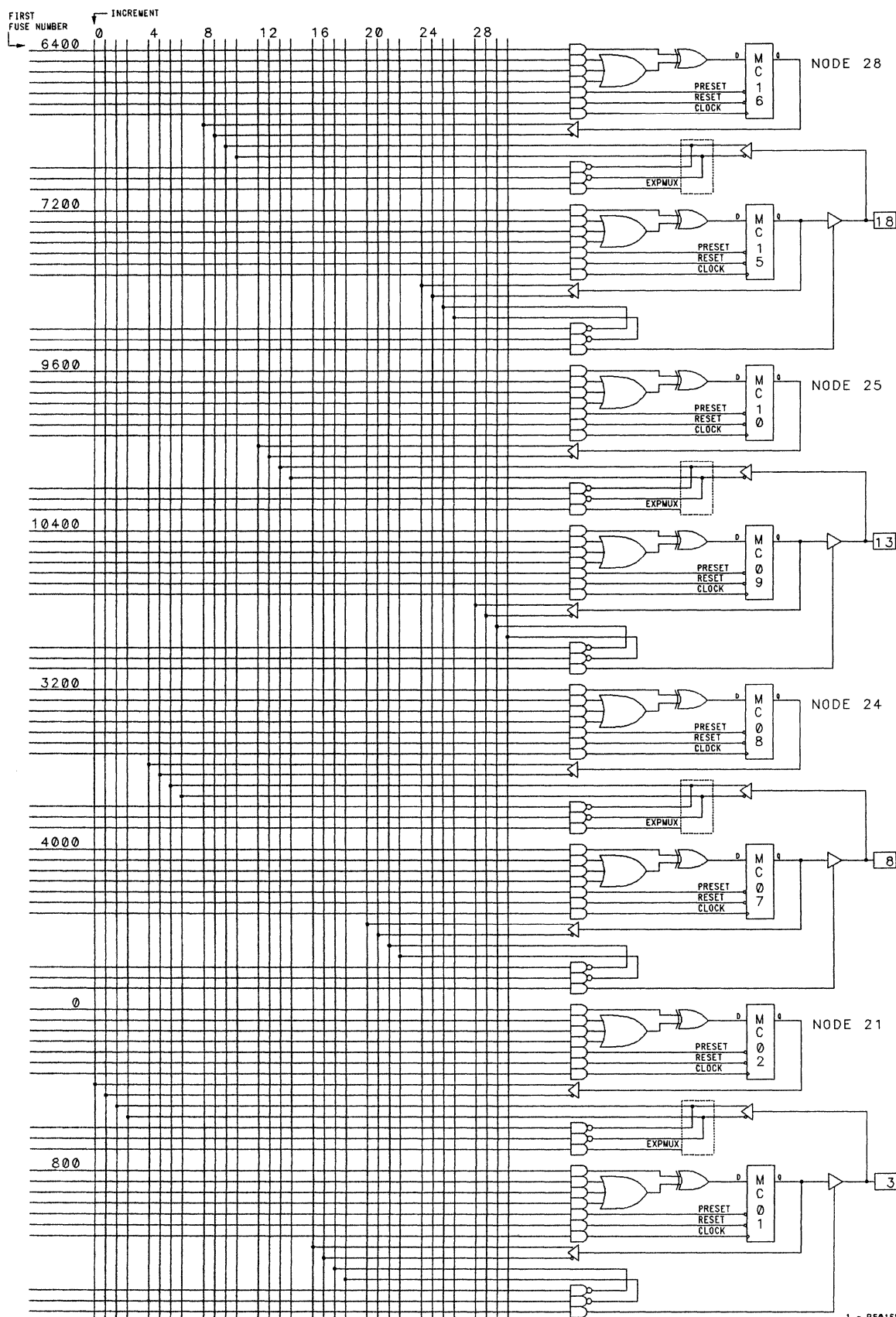
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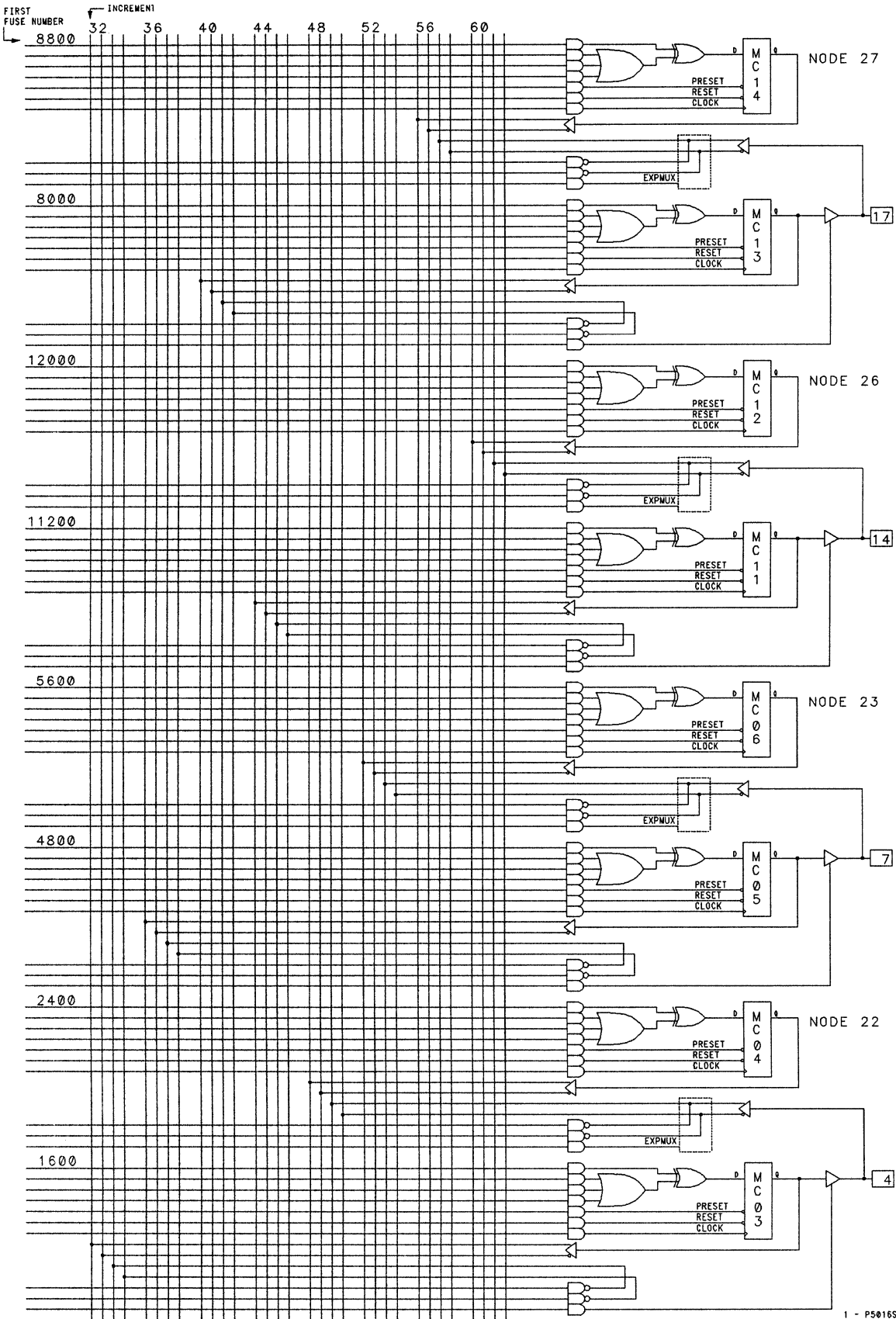
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Data I/O Corporation



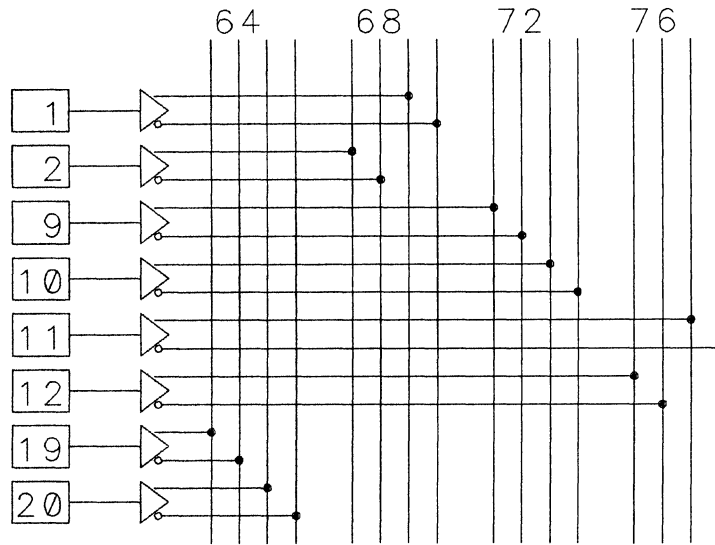
NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

1 - P5016S is synchronous mode operation. Clcking from pin 2.

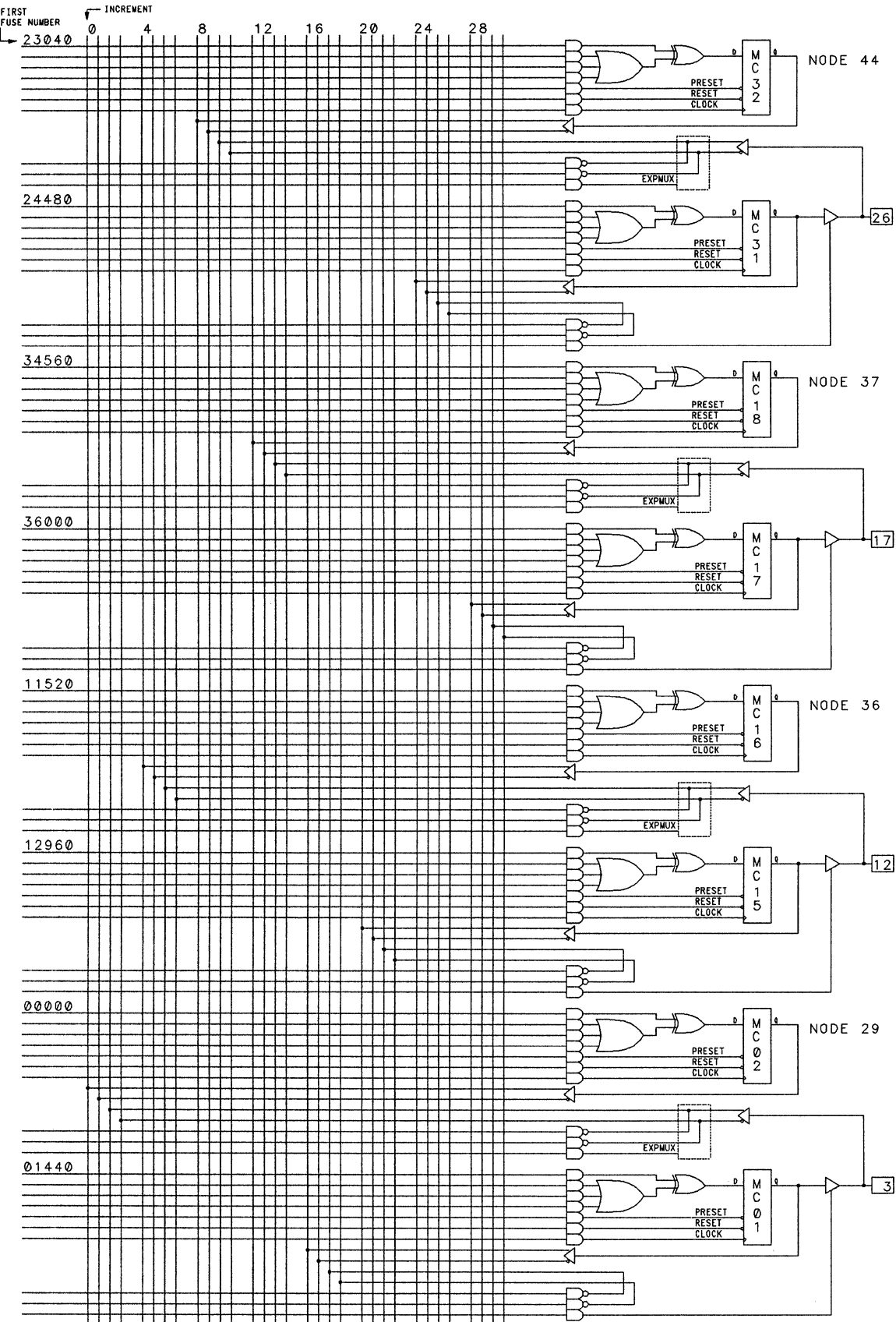


1 - P5016S is synchronous mode operation. Clacking from pin 2.

Data I/O Corporation



1 - P5016S is synchronous mode operation. Clocking from pin 2.



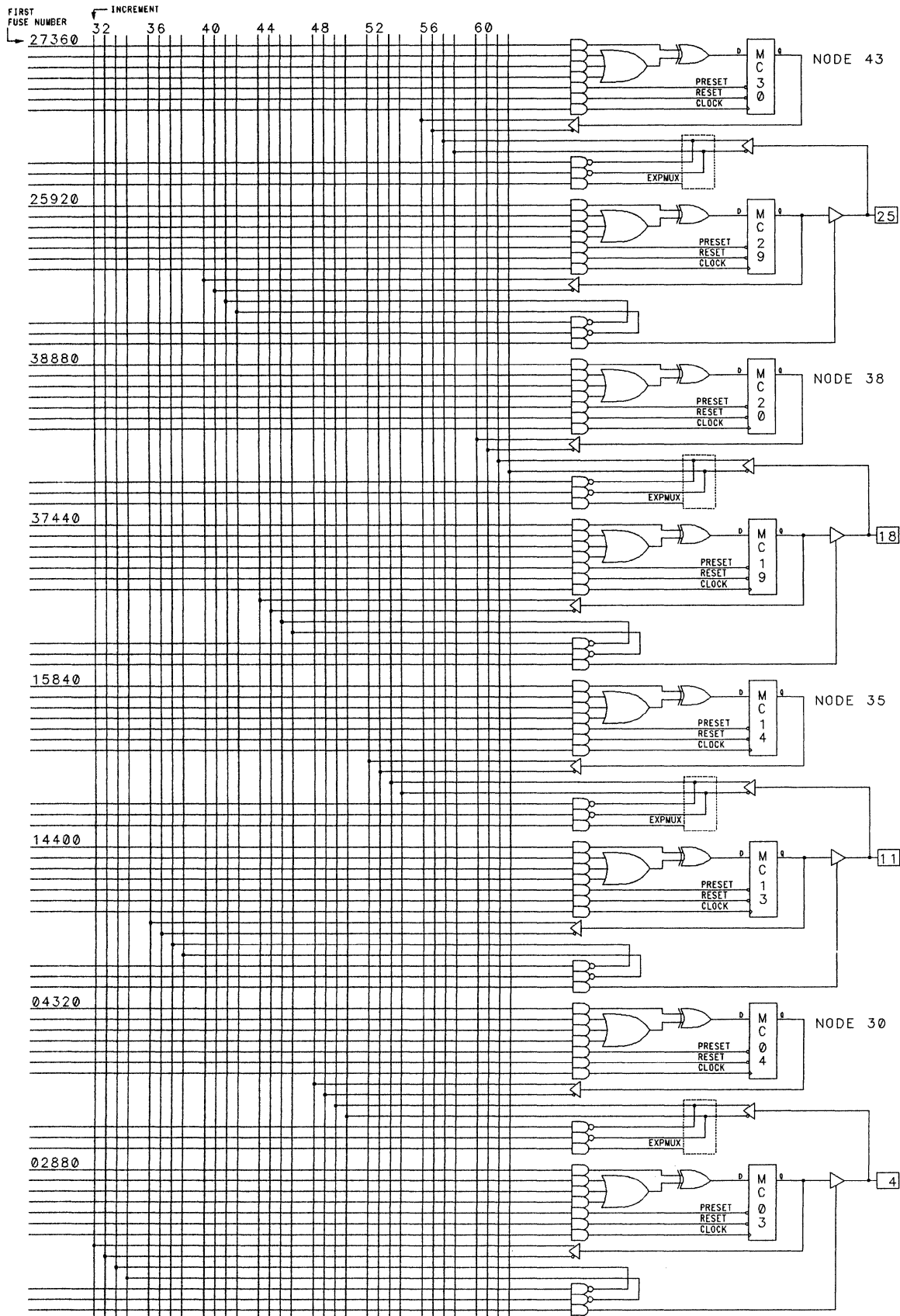
NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

1 - P5032S is synchronous mode operation. Clocking from pin 2.

Data I/O Corporation

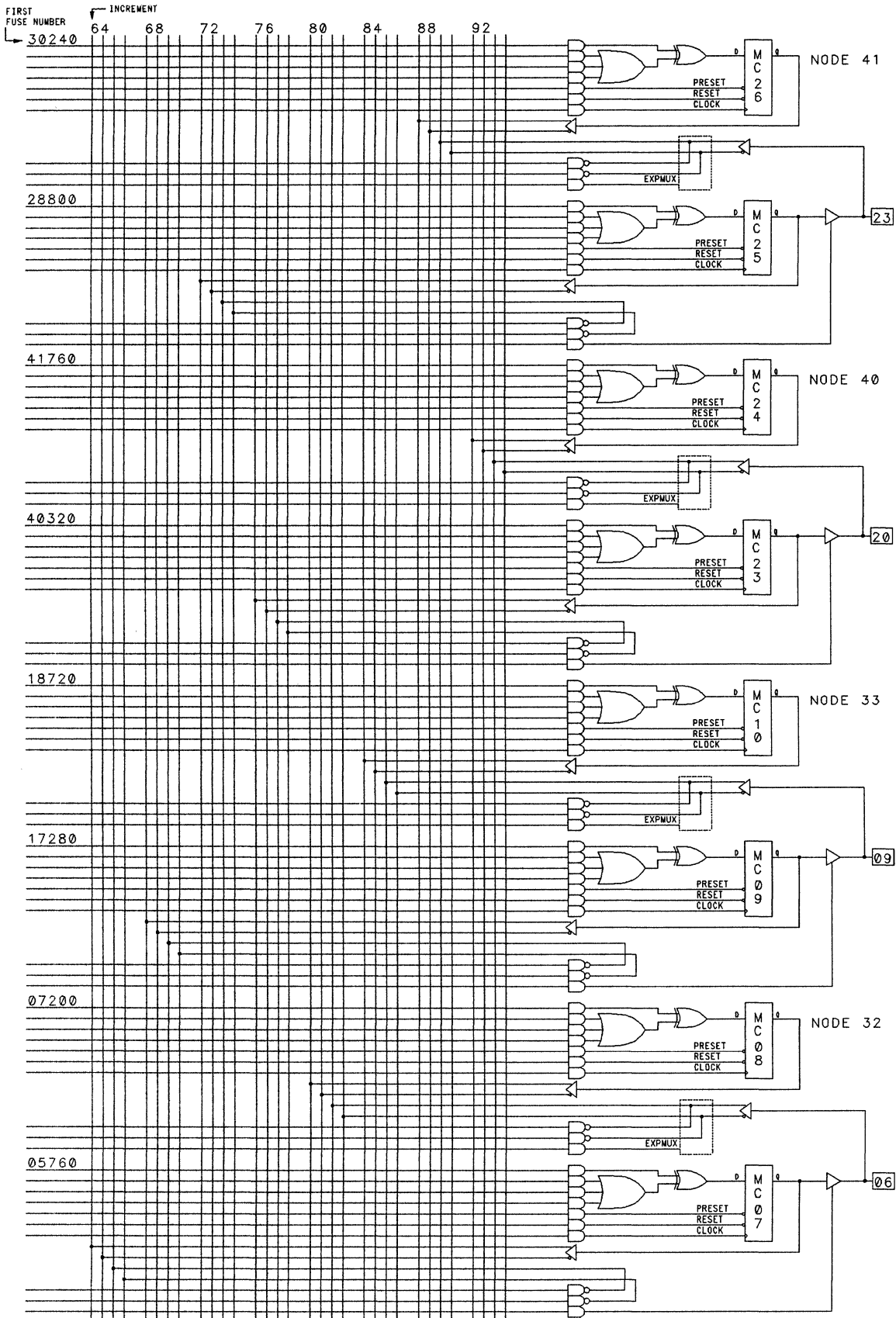


Corporation  
Data I/O



NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

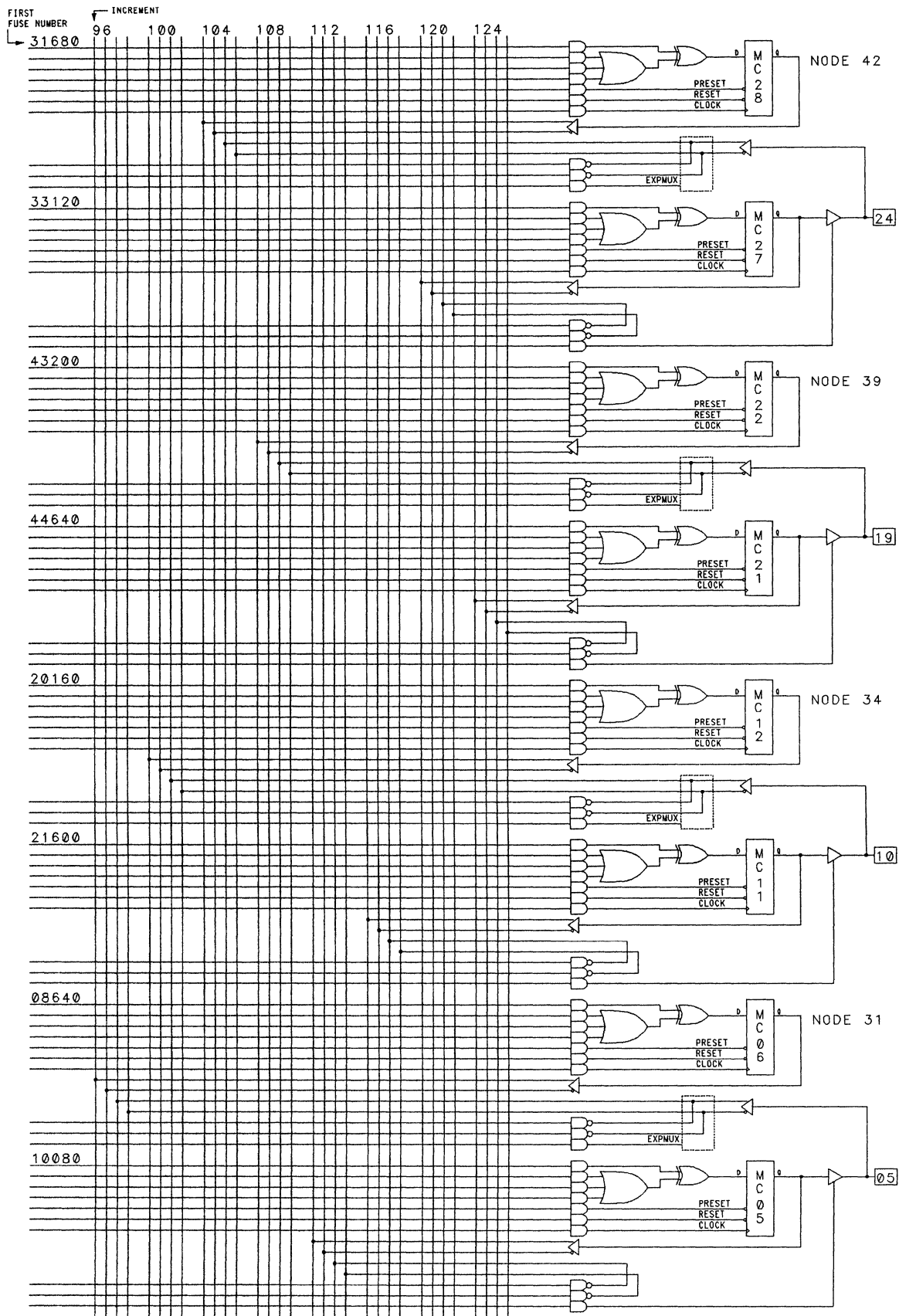
1 - P5032S is asynchronous mode operation. Clocking from pin 2.



NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

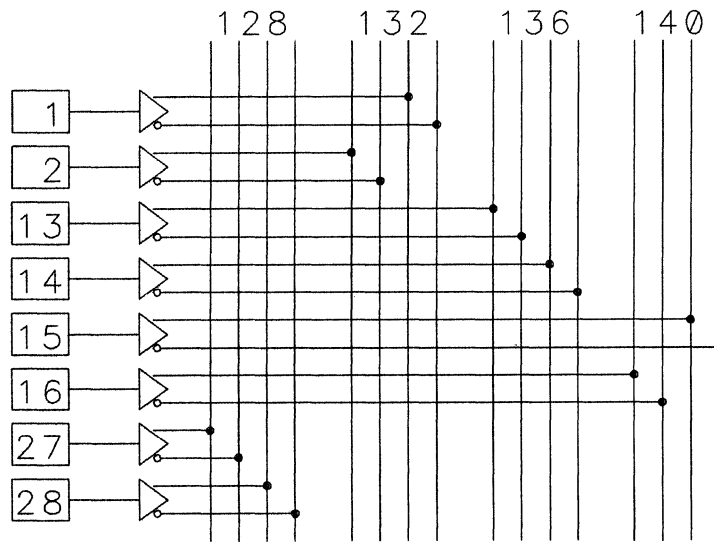
1 - P5032S is synchronous mode operation. Clocking from pin 2.

Data I/O Corporation



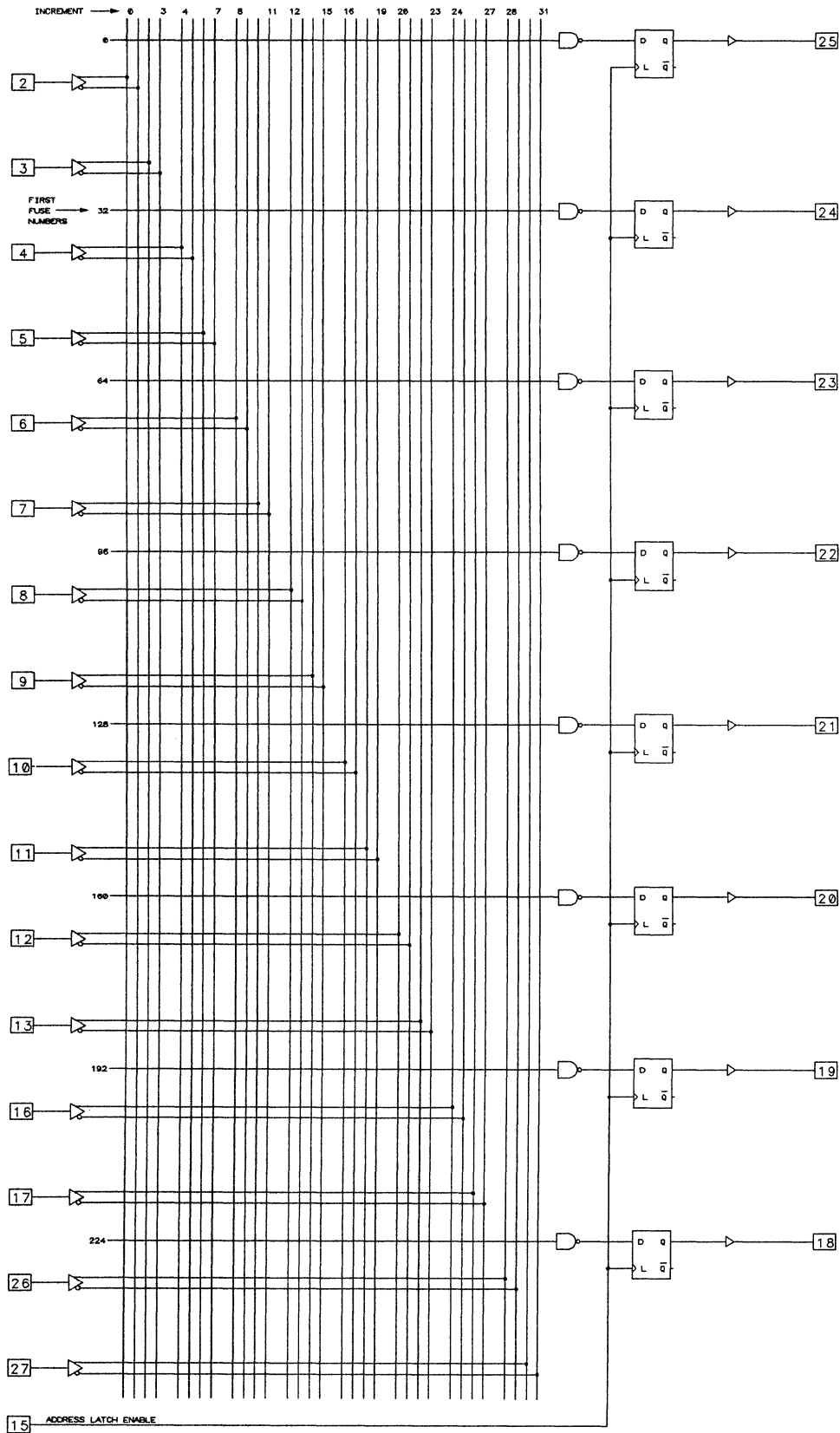
NOTE: FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

1 - P5032S is synchronous mode operation. Clocking from pin 2.

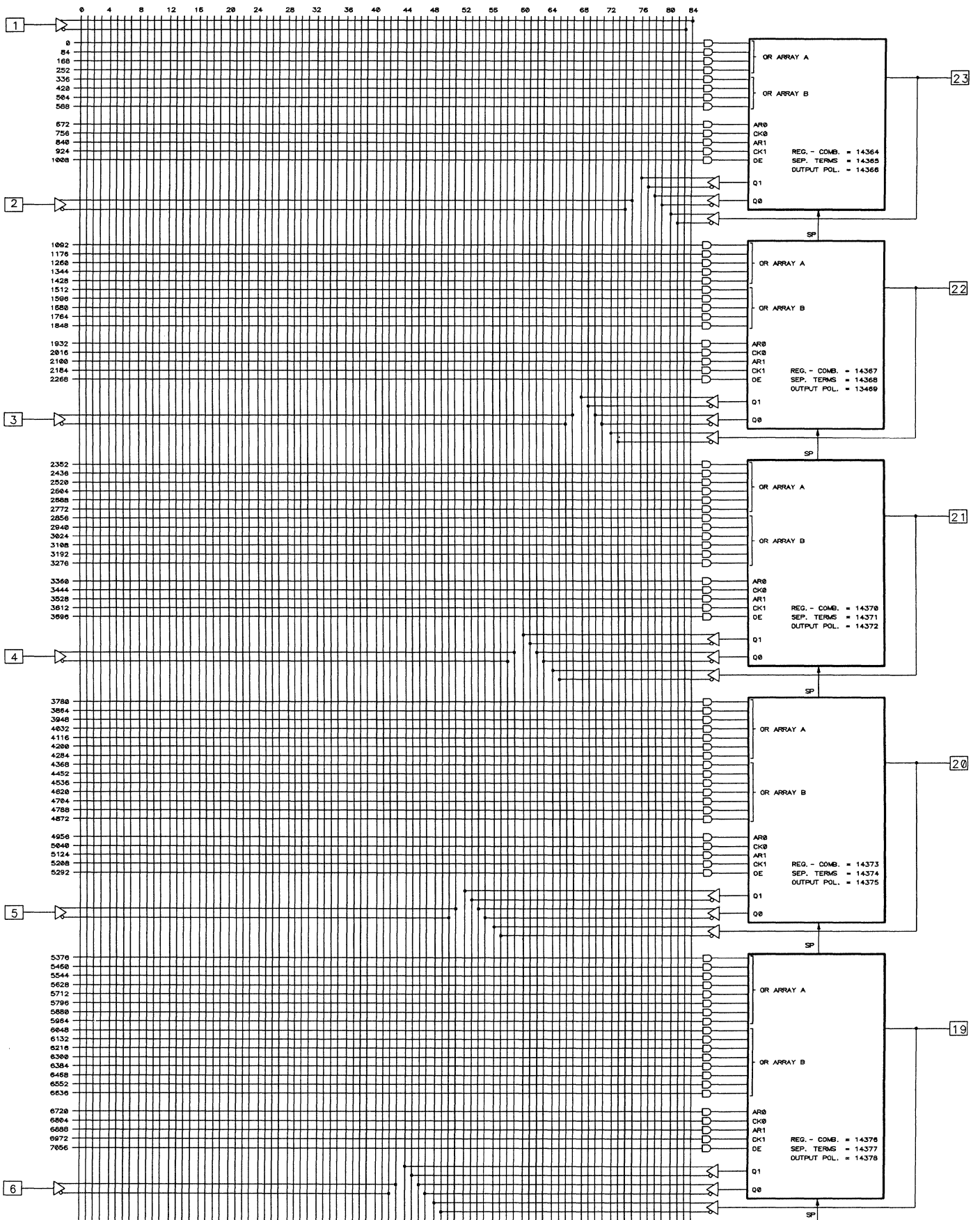


**Data I/O Corporation**

Data I/O Corporation



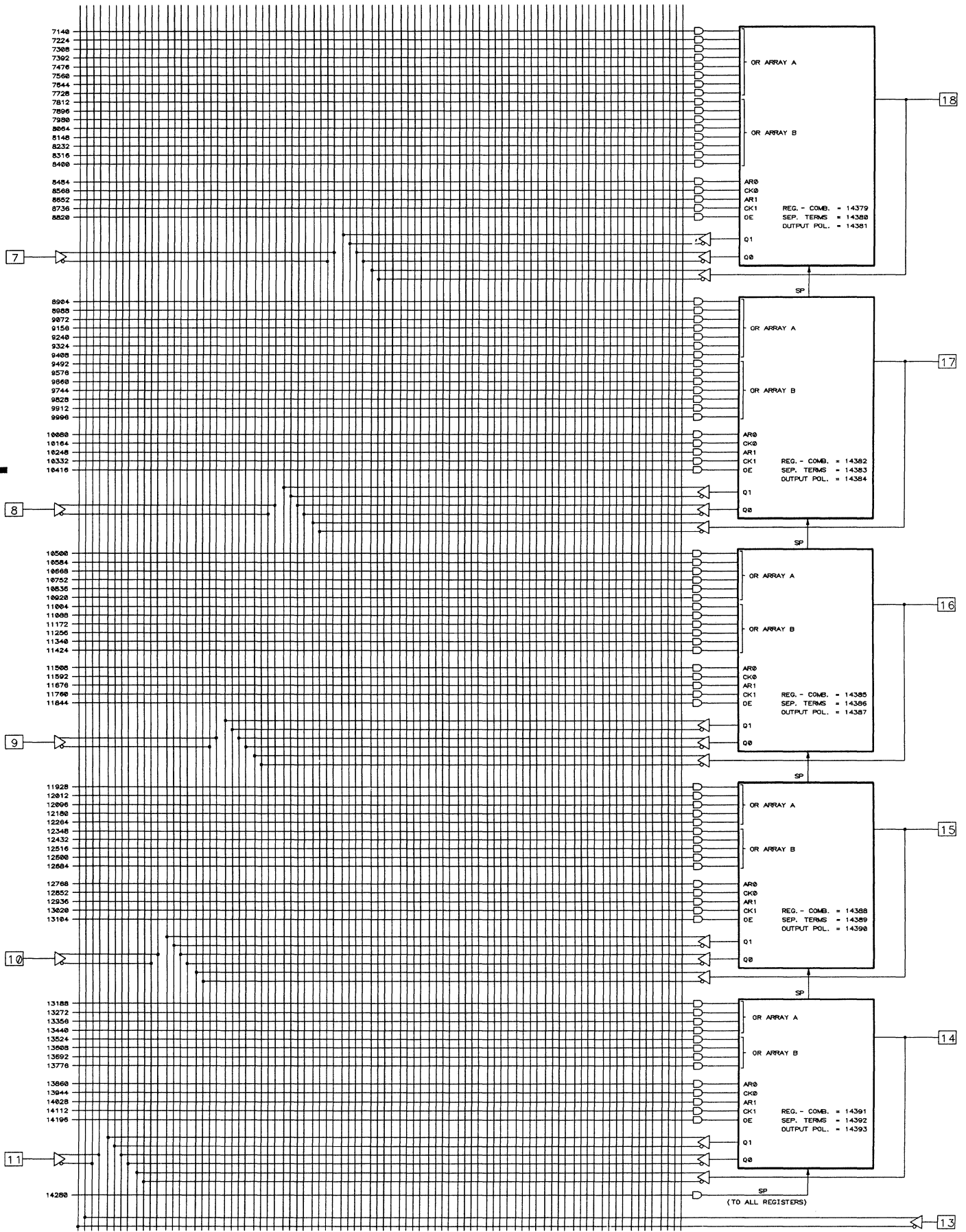
FUSE NUMBER = FIRST FUSE + INCREMENT

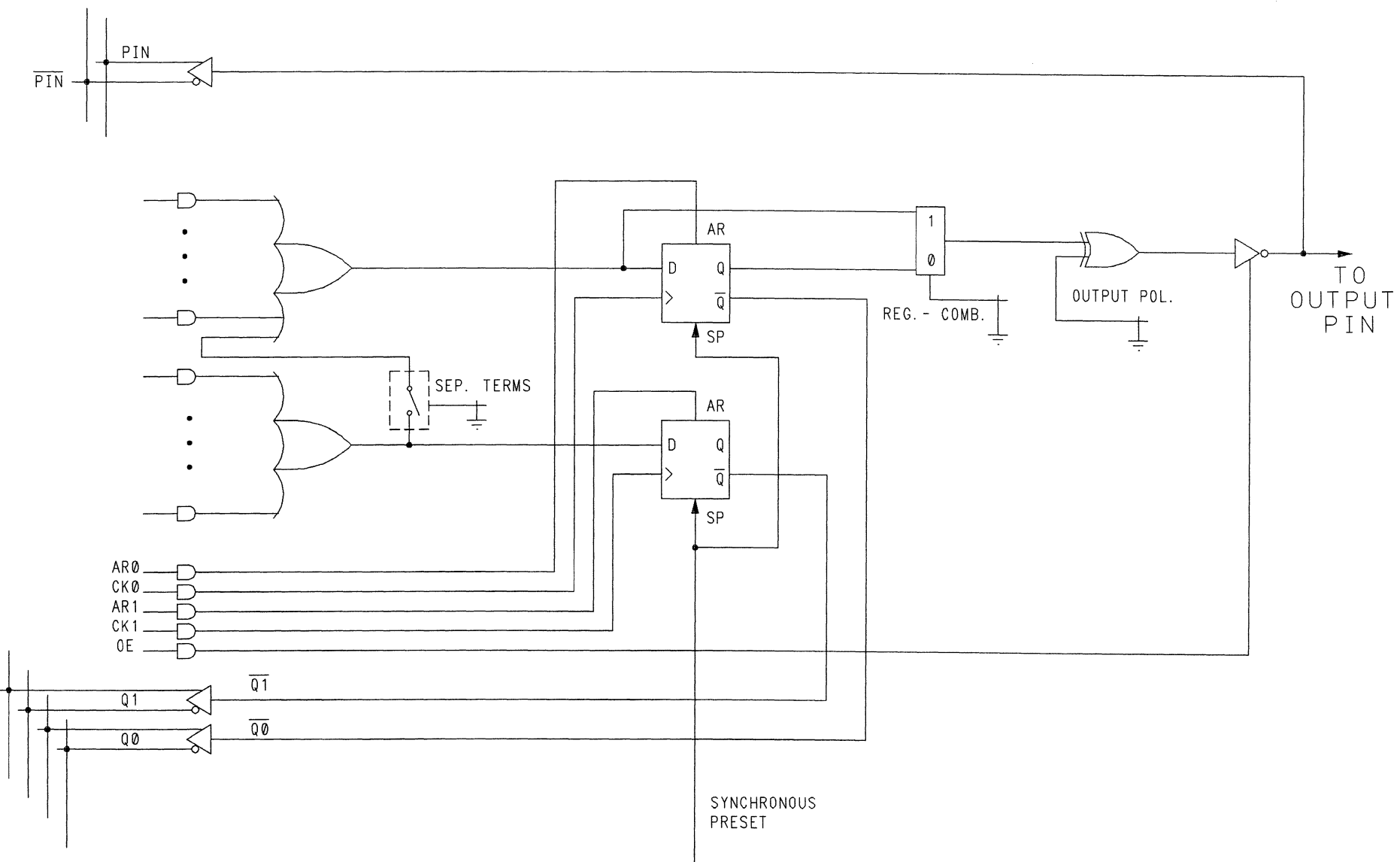


Data I/O Corporation

Corporation

Data I/O

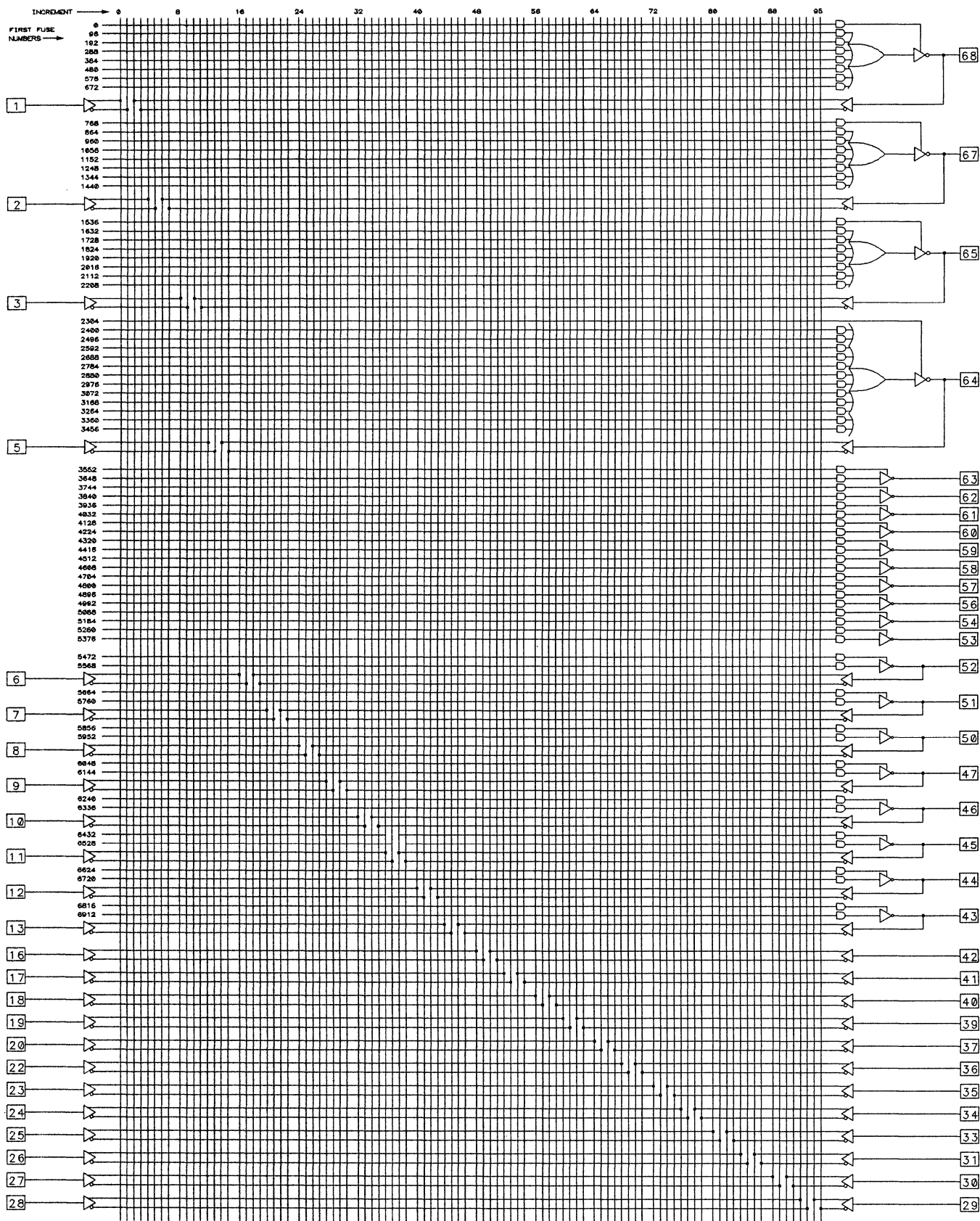




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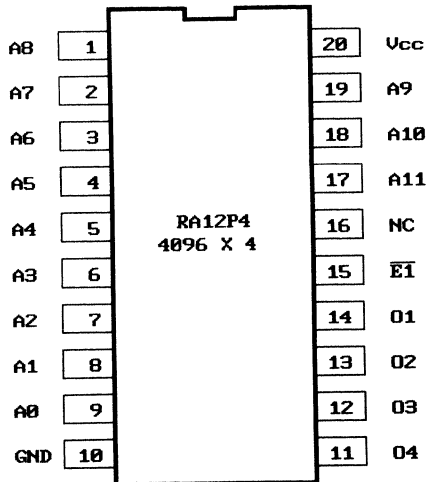
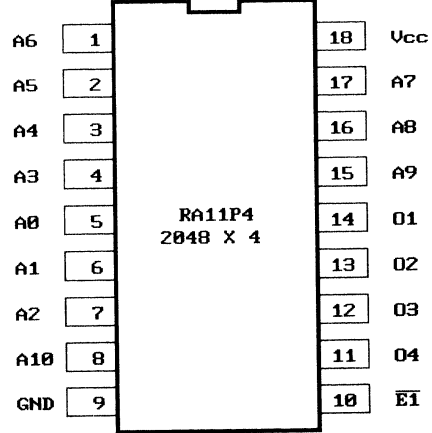
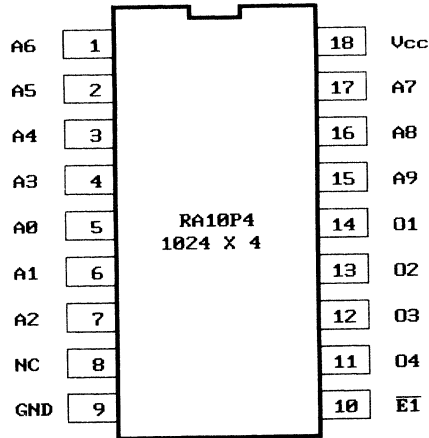
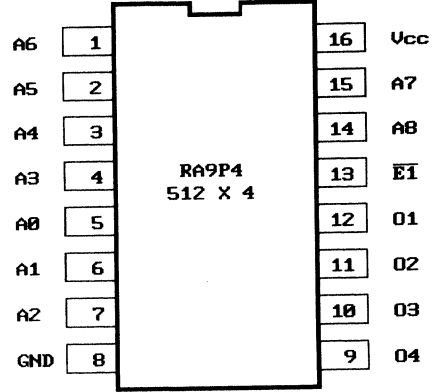
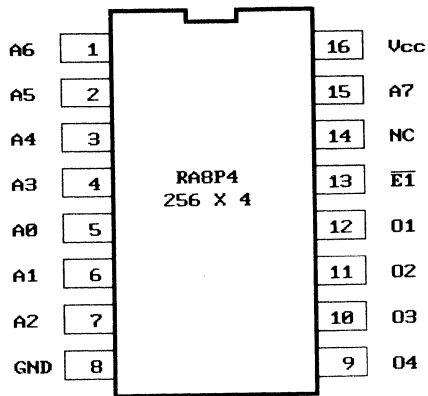


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Data I/O

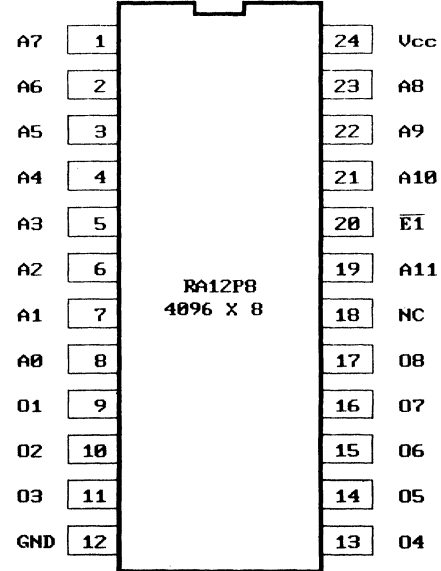
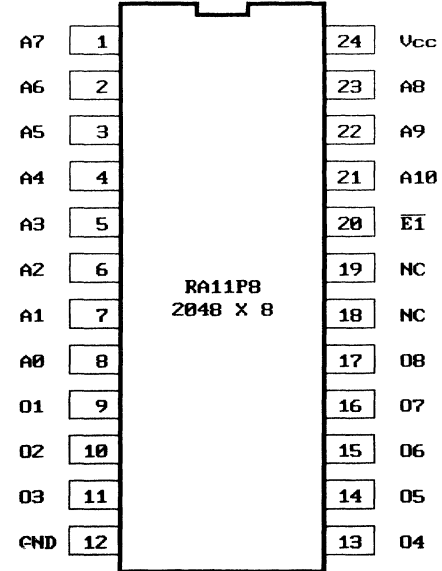
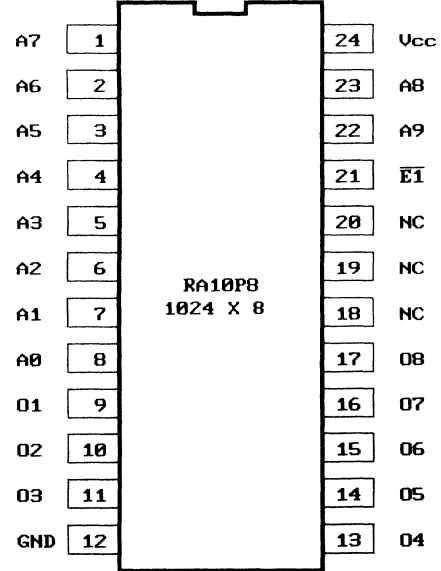
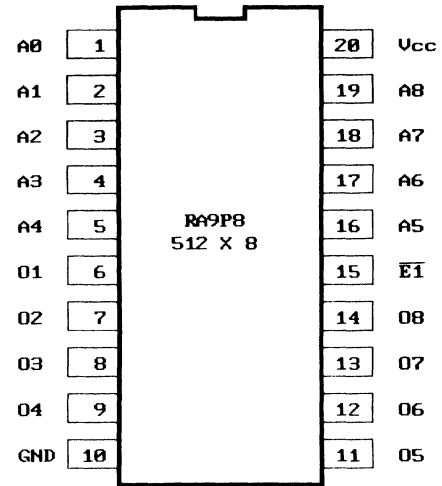
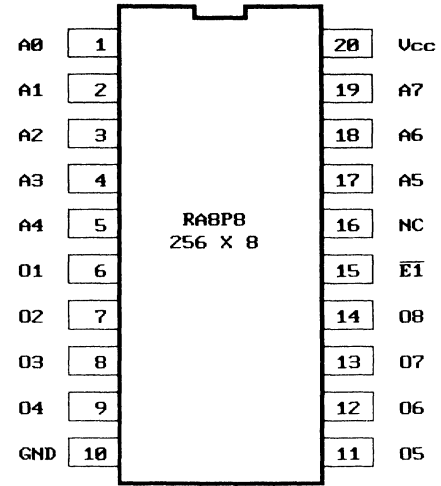
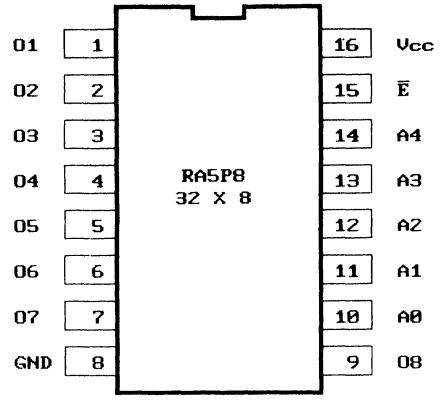


FUSE NUMBER = FIRST FUSE NUMBER + INCREMENT

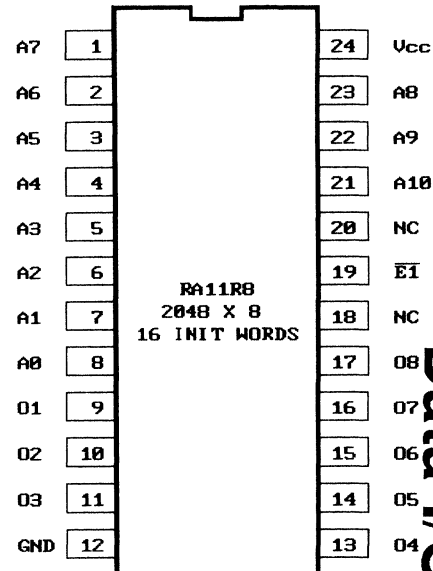
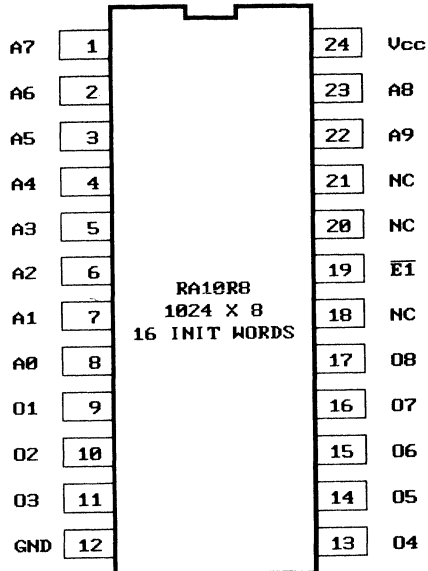
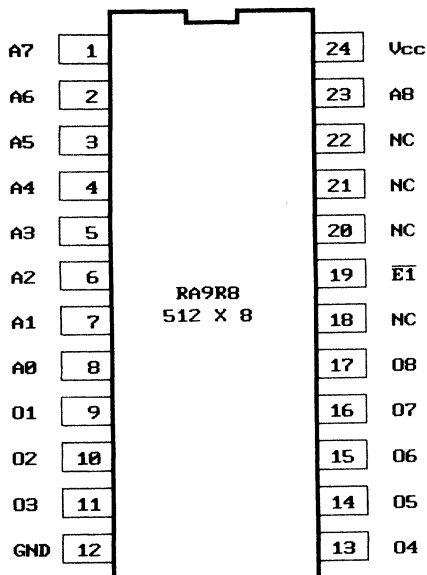
## PINOUT DIAGRAMS 4-BIT PROMS



## PINOUT DIAGRAMS 8-BIT PROMS

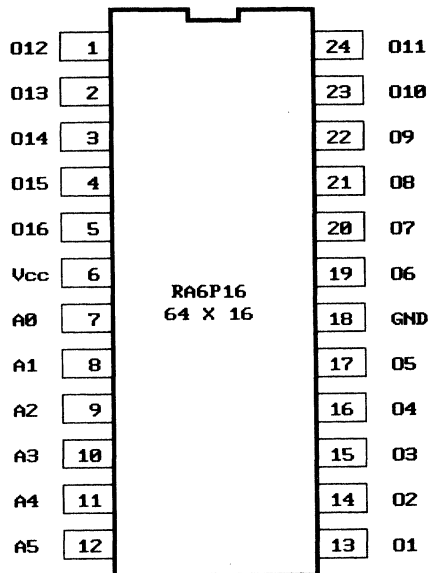
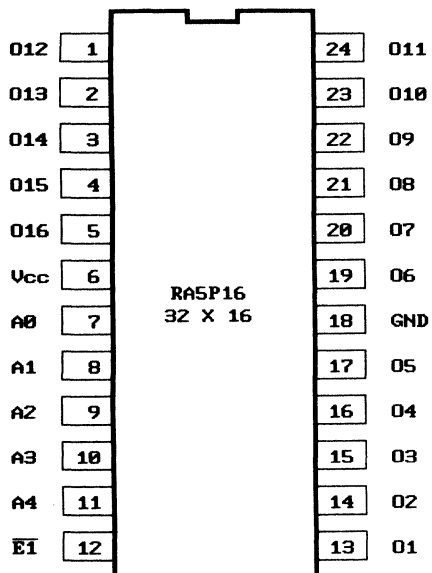


## PINOUT DIAGRAMS 8-BIT PROMS



Data I/O

## PINOUT DIAGRAMS 16-BIT PROMS



Corporation