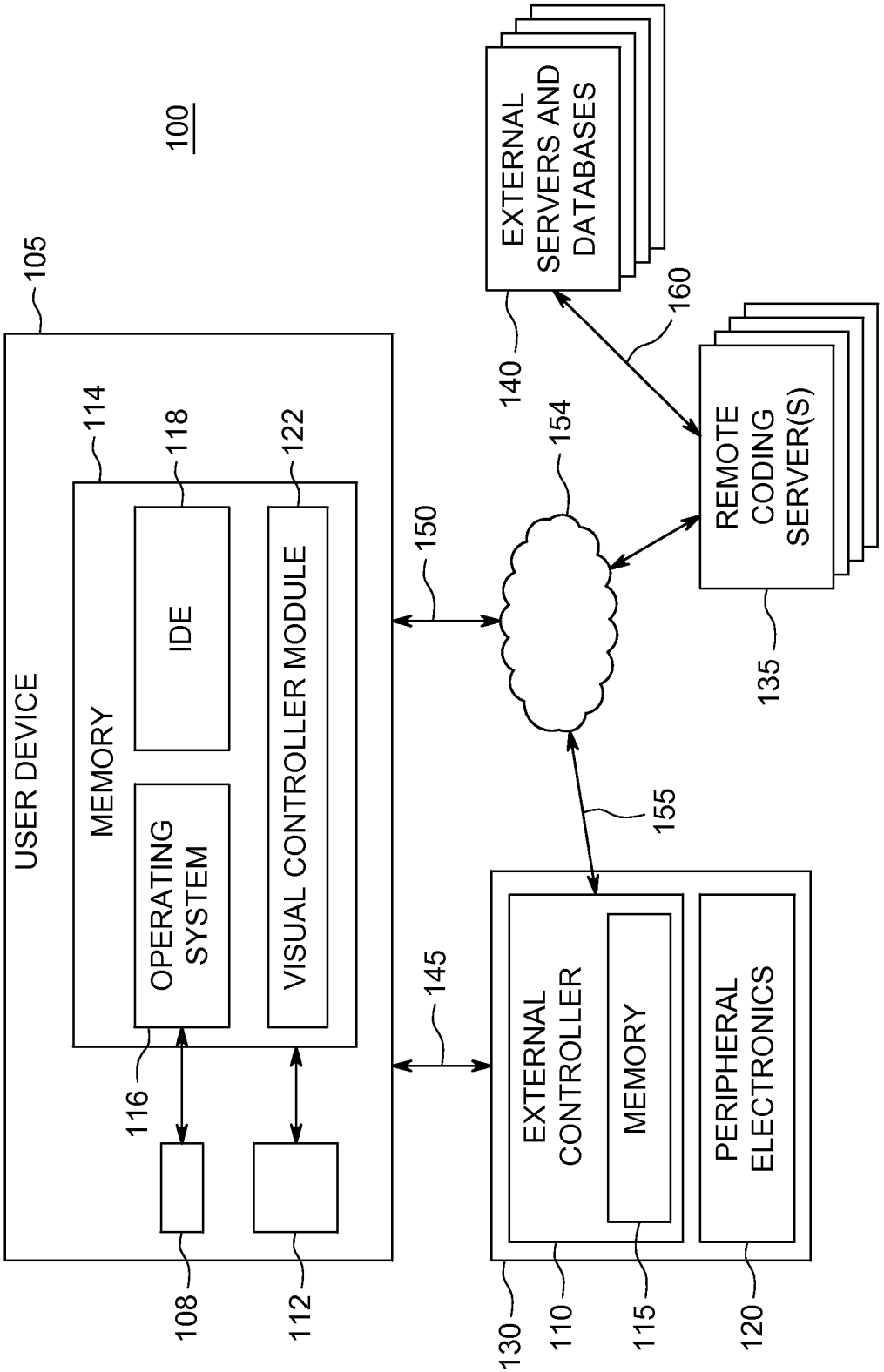
100
105
USER DEVICE
MEMORY
114
IDE
118
OPERATING SYSTEM
VISUAL CONTROLLER MODULE
122
116
108
112
150
145
154
155
EXTERNAL SERVERS AND DATABASES
140
160
REMOTE CODING SERVER(S)
135
EXTERNAL CONTROLLER
MEMORY
PERIPHERAL ELECTRONICS
130
110
115
120

FIG. 1

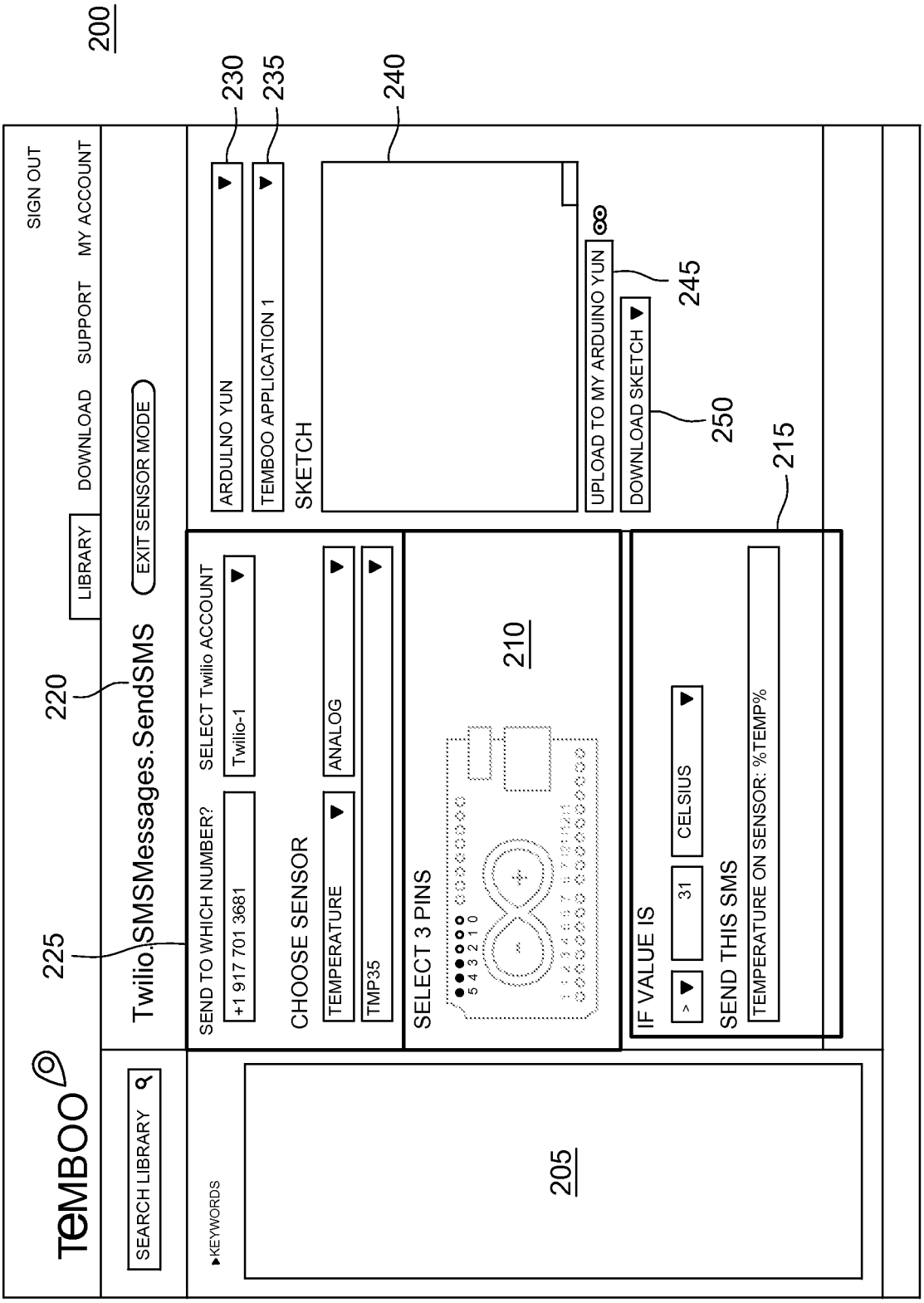
200
230
235
240
SIGN OUT
MY ACCOUNT
SUPPORT
DOWNLOAD
LIBRARY
EXIT SENSOR MODE
220
Twilio.SMSMessages.SendSMS
225
TEMBOO
SEARCH LIBRARY
KEYWORDS
205
SEND TO WHICH NUMBER?
+1 917 701 3681
SELECT Twilio ACCOUNT
Twilio-1
CHOOSE SENSOR
TEMPERATURE
ANALOG
TMP35
SELECT 3 PINS
210
ARDULNO YUN
TEMBOO APPLICATION 1
SKETCH
UPLOAD TO MY ARDUINO YUN
245
DOWNLOAD SKETCH
250
215
IF VALUE IS
>
31
CELSIUS
SEND THIS SMS
TEMPERATURE ON SENSOR: %TEMP%

FIG. 2

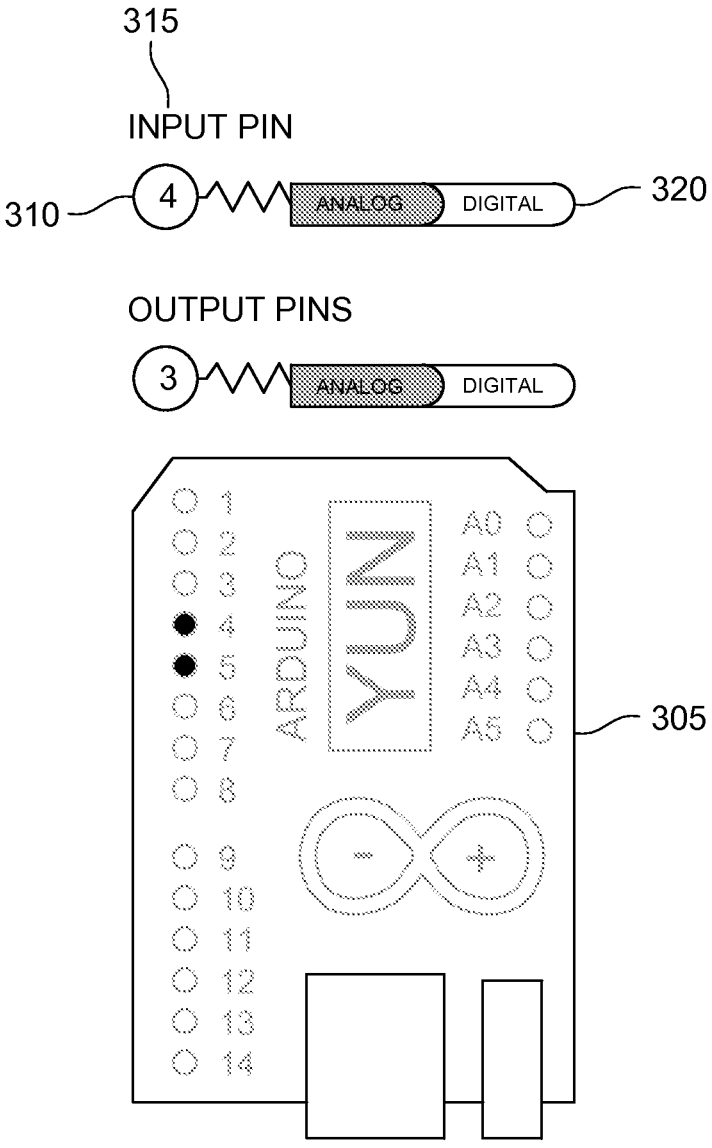
315
INPUT PIN
310
4
ANALOG
DIGITAL
320
OUTPUT PINS
3
ANALOG
DIGITAL
1
2
3
4
5
6
7
8
9
10
11
12
13
14
ARDUINO
YUN
A0
A1
A2
A3
A4
A5
305

FIG. 3

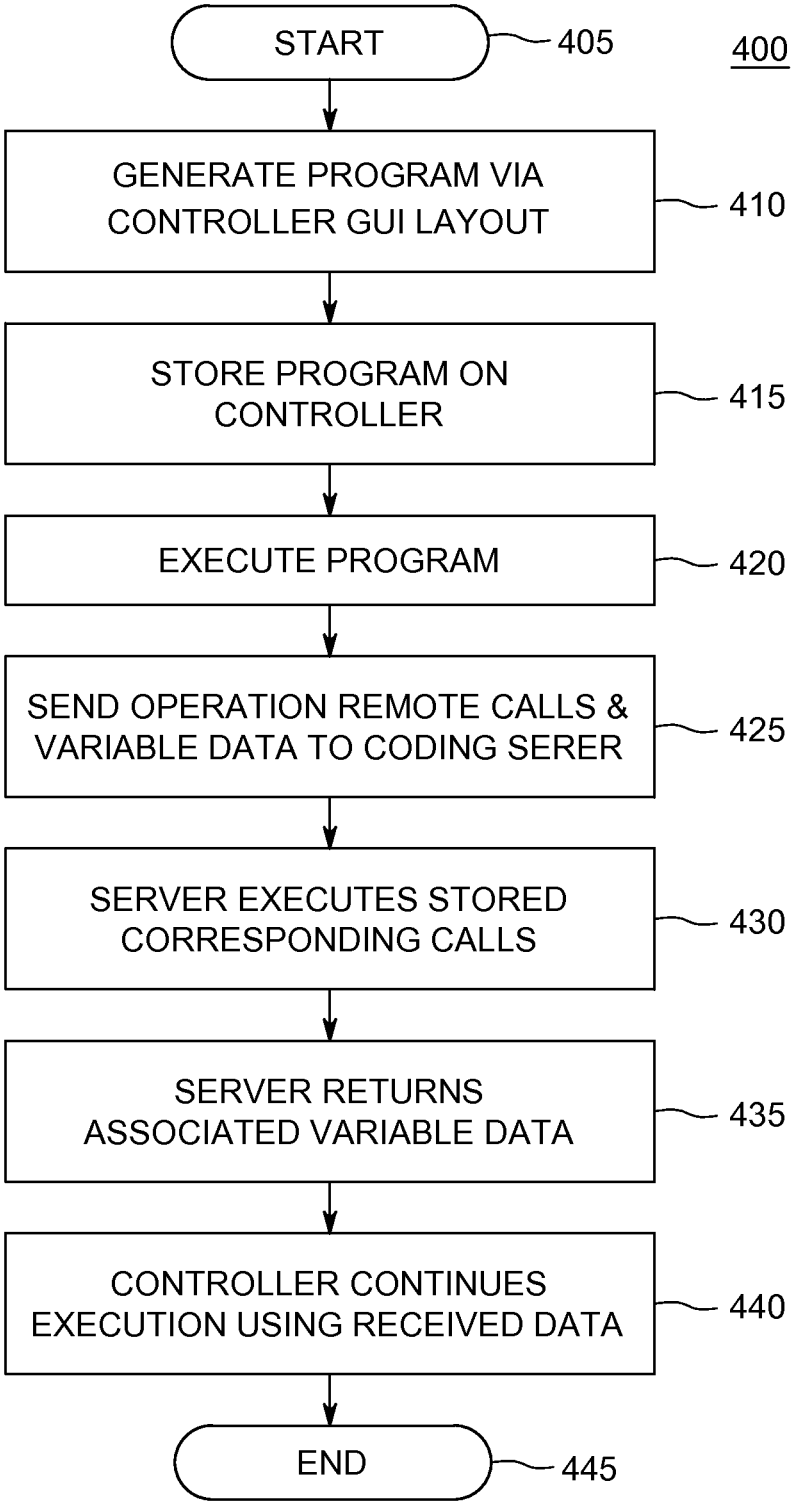
START
405
400
GENERATE PROGRAM VIA CONTROLLER GUI LAYOUT
410
STORE PROGRAM ON CONTROLLER
415
EXECUTE PROGRAM
420
SEND OPERATION REMOTE CALLS & VARIABLE DATA TO CODING SERER
425
SERVER EXECUTES STORED CORRESPONDING CALLS
430
SERVER RETURNS ASSOCIATED VARIABLE DATA
435
CONTROLLER CONTINUES EXECUTION USING RECEIVED DATA
440
END
445

FIG. 4

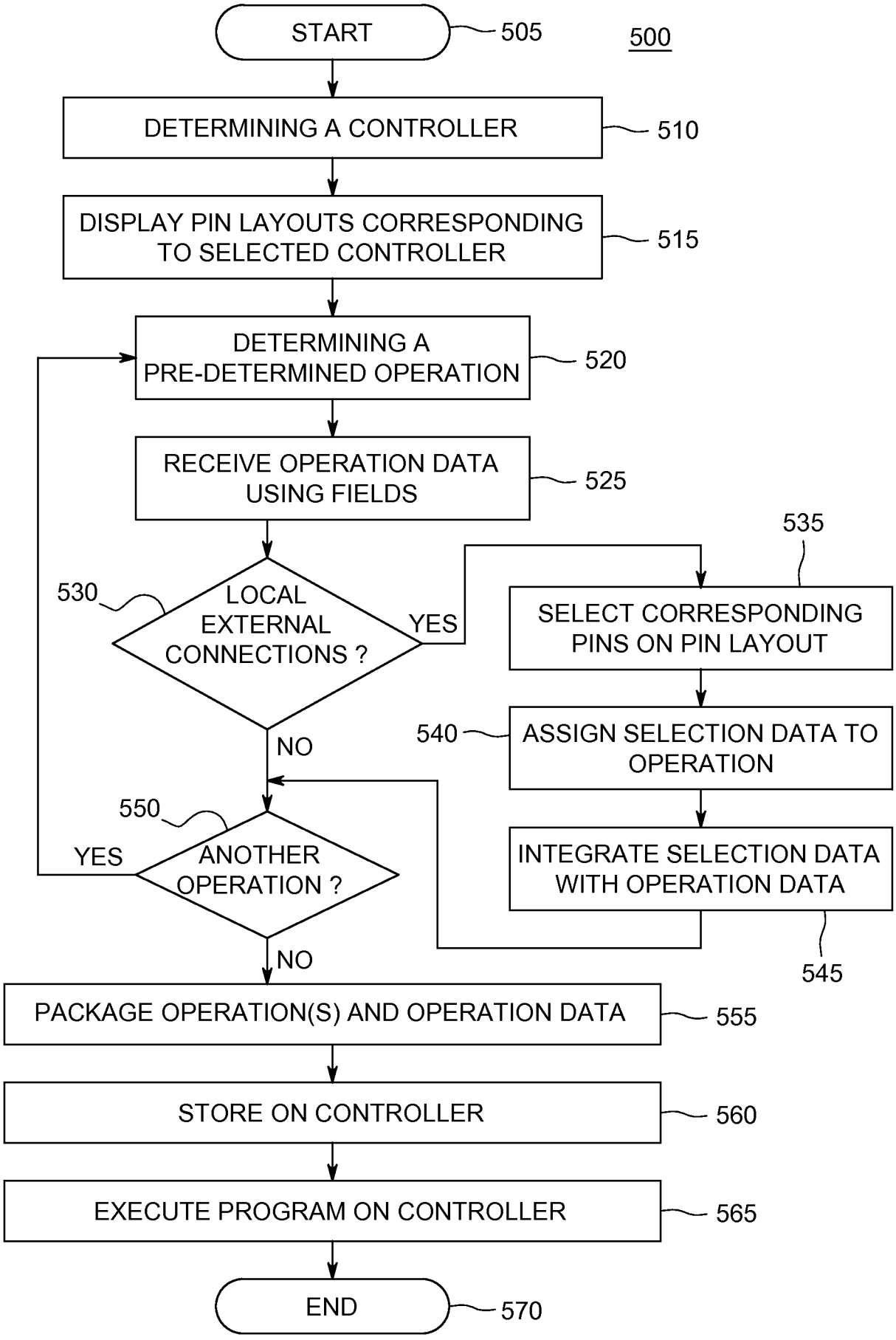
START
505
500
DETERMINING A CONTROLLER
510
DISPLAY PIN LAYOUTS CORRESPONDING TO SELECTED CONTROLLER
515
DETERMINING A PRE-DETERMINED OPERATION
520
RECEIVE OPERATION DATA USING FIELDS
525
530
LOCAL EXTERNAL CONNECTIONS ?
YES
NO
535
SELECT CORRESPONDING PINS ON PIN LAYOUT
540
ASSIGN SELECTION DATA TO OPERATION
INTEGRATE SELECTION DATA WITH OPERATION DATA
545
550
ANOTHER OPERATION ?
YES
NO
PACKAGE OPERATION(S) AND OPERATION DATA
555
STORE ON CONTROLLER
560
EXECUTE PROGRAM ON CONTROLLER
565
END
570

FIG. 5

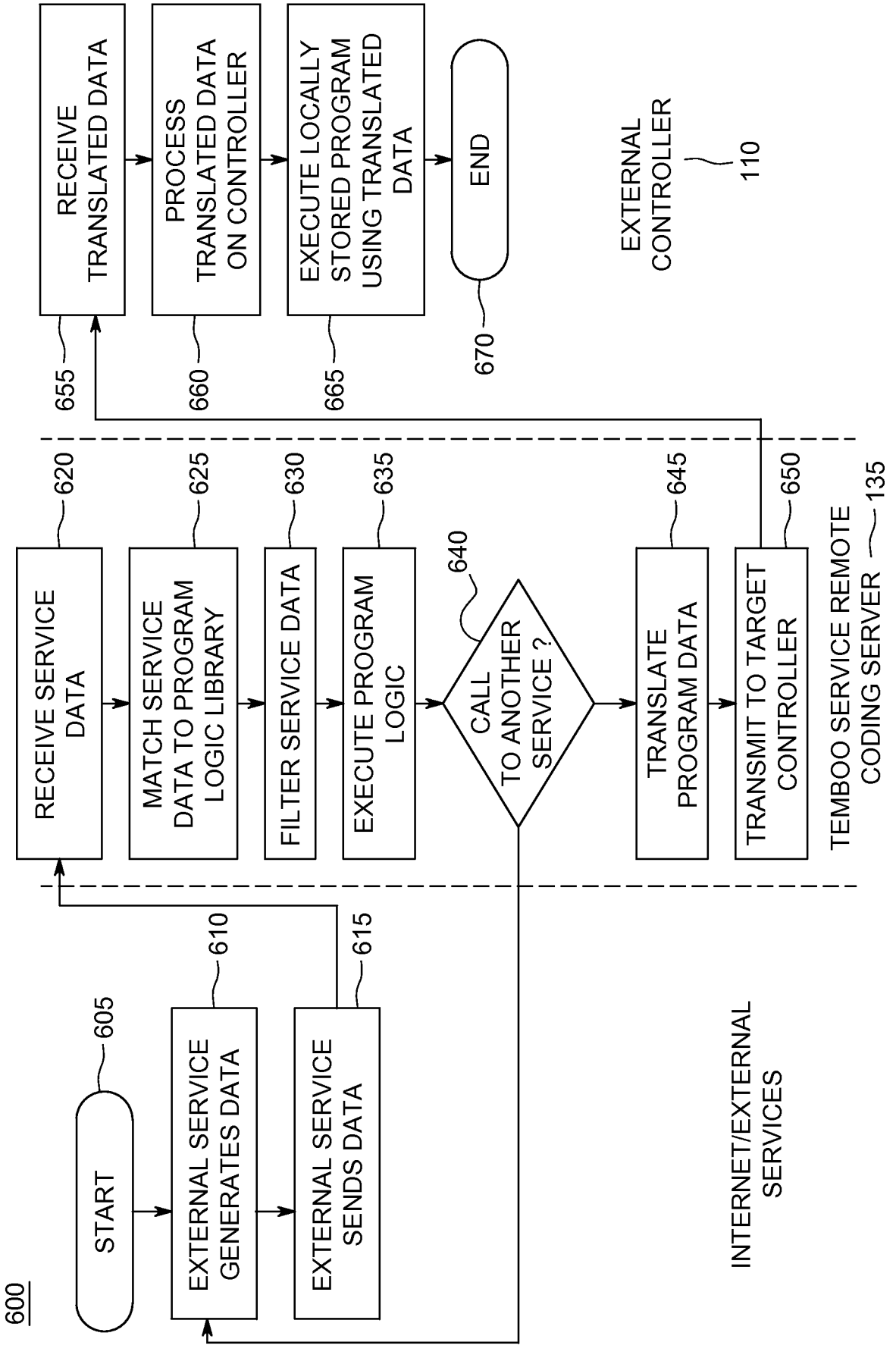
600
START
605
EXTERNAL SERVICE GENERATES DATA
610
EXTERNAL SERVICE SENDS DATA
615
INTERNET/EXTERNAL SERVICES
RECEIVE SERVICE DATA
620
MATCH SERVICE DATA TO PROGRAM LOGIC LIBRARY
625
FILTER SERVICE DATA
630
EXECUTE PROGRAM LOGIC
635
CALL TO ANOTHER SERVICE ?
640
TRANSLATE PROGRAM DATA
645
TRANSMIT TO TARGET CONTROLLER
650
TEMBOO SERVICE REMOTE CODING SERVER
135
RECEIVE TRANSLATED DATA
655
PROCESS TRANSLATED DATA ON CONTROLLER
660
EXECUTE LOCALLY STORED PROGRAM USING TRANSLATED DATA
665
END
670
EXTERNAL CONTROLLER
110

FIG. 6

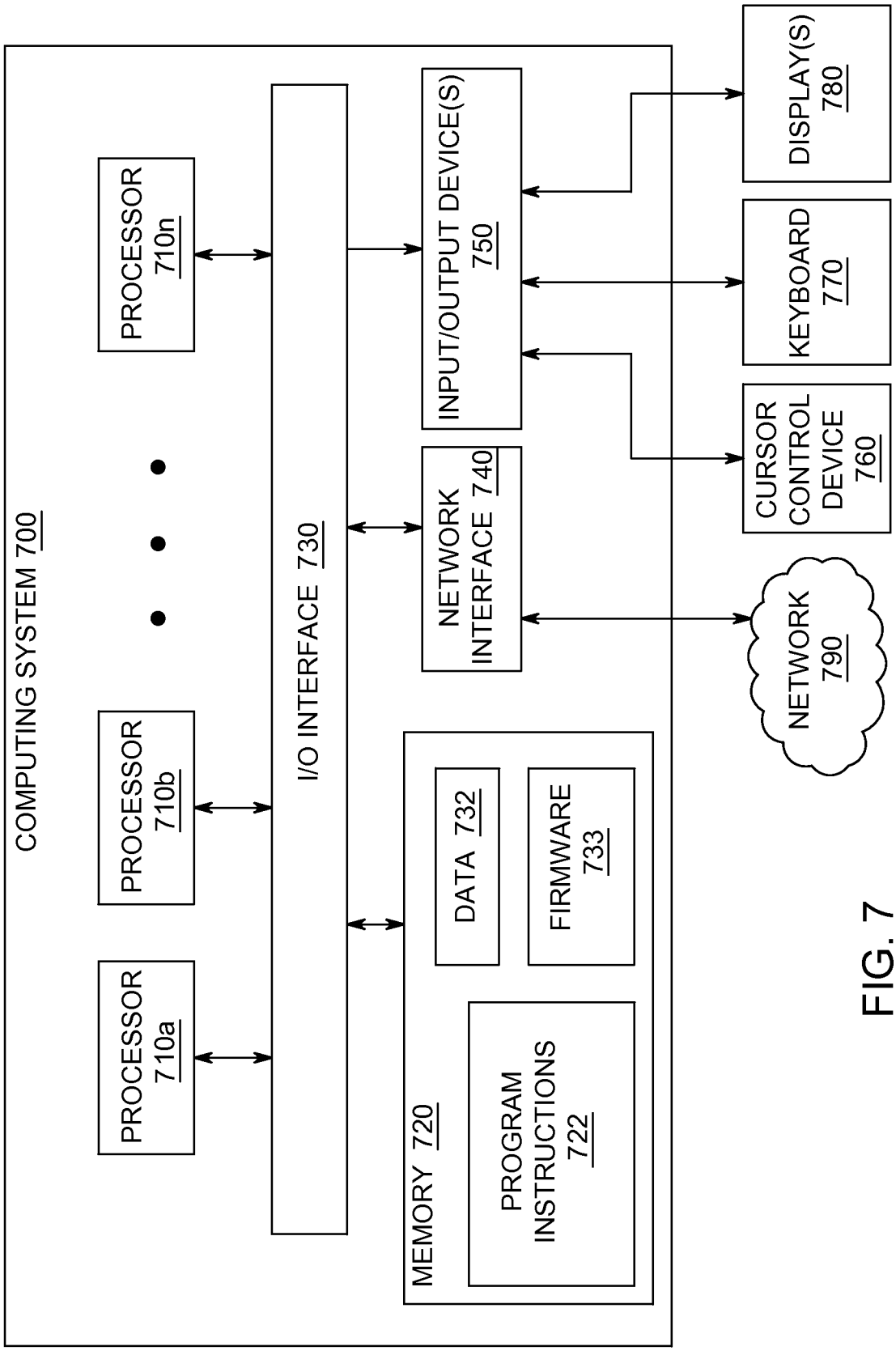
COMPUTING SYSTEM 700
PROCESSOR 710a
PROCESSOR 710b
PROCESSOR 710n
I/O INTERFACE 730
MEMORY 720
PROGRAM INSTRUCTIONS 722
DATA 732
FIRMWARE 733
NETWORK INTERFACE 740
INPUT/OUTPUT DEVICE(S) 750
CURSOR CONTROL DEVICE 760
KEYBOARD 770
DISPLAY(S) 780
NETWORK 790

FIG. 7