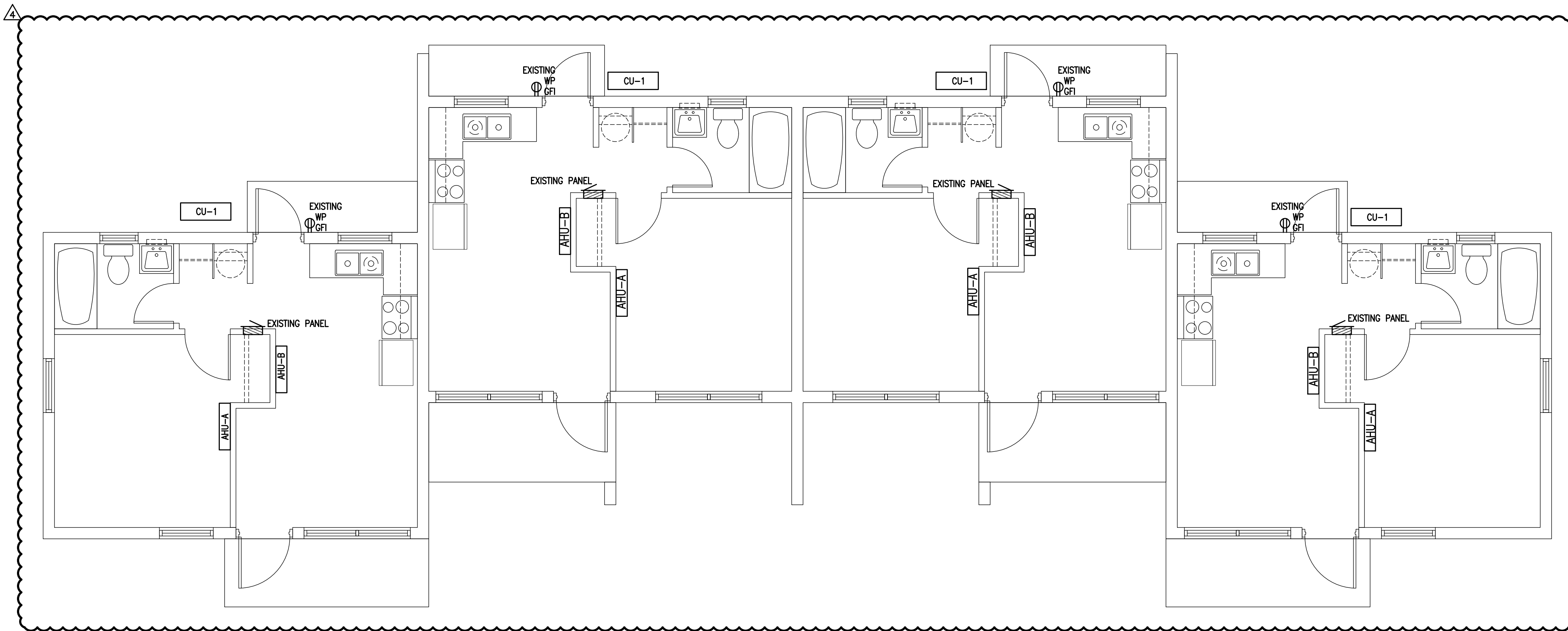


### ELECTRICAL SCOPE OF WORK

- DISCONNECT AND REMOVE THE ELECTRICAL SPACE HEATERS AND PATCH THE WALL.
- REMOVE THE CIRCUIT BREAKERS FROM THE PANEL THAT FED THE EXISTING SPACE HEATERS. INSTALL BLANKS IN UNUSED CIRCUIT BREAKER SPACES.
- FURNISH & INSTALL ONE (1) NEW CIRCUIT BREAKERS IN EACH PANEL TO FEED THE NEW MINI-SPLIT AIR HANDLING UNITS AND CONDENSER UNIT AS FOLLOWS:
  - ONE BEDROOM - CU, 2-POLE 25A
- FURNISH AND INSTALL 1/2" EMT CONDUIT AND (2) #10 AWG, CU & (1) #10 AWG, CU GROUND FROM THE EXISTING PANEL TO THE CU.
- FURNISH & INSTALL A 30A, 2-POLE, NON-FUSED DISCONNECT SWITCH FOR THE CU. THE DISCONNECT SWITCH FOR THE CU SHALL BE NEMA 3R RATED. INDOOR UNITS ARE POWERED FROM THE EXTERIOR UNIT.



### SECTION A - QUADPLEX MECHANICAL PLAN

SCALE: 1/4" = 1'-0"

### SERVICE ENTRANCE SIZE CALCULATIONS

#### UNIT DATA:

THE DWELLING UNIT HAS AN AREA OF THE FOLLOWING:  
 DWELLING UNIT FLOOR AREA: 408 SQ-FT  
 UNIT HAS AN ELECTRIC RANGE  
 THE LARGER LOAD OF ELECTRIC HEAT OR A/C IS USED FOR THE CALCULATIONS  
 THERE WILL BE NO LAUNDRY FACILITIES IN THE DWELLING

#### LOAD CALCULATIONS:

##### GENERAL LOAD

GENERAL LIGHTING LOAD	AT 3.0 VA / SQ-FT	1,224.0 VA
SMALL APPLIANCE LOAD (2 CIRCUITS)		3,000.0 VA
ELECTRIC RANGE		8,000.0 VA
ELECTRIC WATER HEATER		3,600.0 VA
<b>TOTAL GENERAL LOAD</b>		<b>11,600.0 VA</b>

APPLICATION OF DEMAND FACTOR:		
FIRST 10,000 VA @ 100%		10,000.0 VA
REMAINDER OF LOAD AT 40%		640.0 VA
<b>GENERAL LOAD WITH DEMAND FACTOR</b>		<b>10,640.0 VA</b>

##### AIR CONDITIONING/HEATING LOAD

HEATING / (FUTURE) A/C LOAD		4,320.0 VA
<b>HVAC LOAD</b>		<b>4,320.0 VA</b>

GENERAL LOAD WITH DEMAND FACTOR	10,640.0 VA
HVAC LOAD	4,320.0 VA
<b>TOTAL DWELLING LOAD</b>	<b>14,960.0 VA</b>

62.3 A @ 120/240V 1-PHASE

SERVICE SIZE FOR EACH DWELLING UNIT: 100A

### EXISTING QUADPLEX PANEL SCHEDULE - SECTION A

COLLIER COUNTY HOUSING AUTHORITY  
 IMMOKALEE / COLLIER COUNTY, FLORIDA

PANEL RATING: 100A  
 VOLTAGE: 120 / 240  
 NUMBER OF PHASES: 1  
 SERVICE ENTRANCE RATED: NO

MOUNTING: RECESS  
 MAIN BREAKER RATING: MLO  
 GROUND STRAP REQ'D: NO  
 MANUFACTURER: AS SPECIFIED

NO	A	P	NOTE	DESCRIPTION	WATTS	kw-L1	kw-L2	WATTS	DESCRIPTION	NOTE	P	A	NO
1	50	2		RANGE	6000	7.500		1500	KITCHEN RECEPTACLES	GFCI	1	20	2
3					6000		7.500	1500	KITCHEN RECEPTACLES	GFCI	1	20	4
5	15	1		LIGHTS	1000	1.180		180	BATHROOM	GFCI	1	20	6
7	20	2		WATER HEATER	1500		2.700	1200	GENERAL PURPOSE RECEPTACLES	AFC	1	20	8
9					1500	3.000		1500	GENERAL PURPOSE RECEPTACLES	AFC	1	20	10
11	20	2		SPACE HEATER	1920			1920	SPACE HEATER		2	20	12
13					1920			1920					14
15	20	1		REFRIGERATOR	1500			360	EXTERIOR RECEPTACLES	GFCI	1	20	16

SEE LOAD CALCULATIONS ON THIS SHEET

THIS ITEM HAS BEEN ELECTRONICALLY SIGNED AND SEALED BY STEVEN R. STAFFORD ON THE DATE INDICATED USING A DIGITAL SIGNATURE. PRINTED COPIES OF THIS DOCUMENT ARE NOT CONSIDERED SIGNED AND SEALED AND THE SIGNATURE MUST BE VERIFIED ON ANY ELECTRONIC COPIES.

PROJECT NAME:  
**Farm Worker Village**  
**Collier County Housing Authority**  
 1800 Farm Worker Way  
 Immokalee, Florida 34142

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#	REVISION	DATE
4	OWNER CHANGES	JUNE 26, 2020

DATE: 09/14/16  
 DRAWN BY: R.A.M.  
 CHECKED BY: S.R.S.  
 JOB NUMBER: 16079

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