



**Auer Electric LLC.**  
Residential Commercial



AUER ELECTRIC LLC  
6205 TINWOOD DRIVE  
FUQUAY VARINA, NC 27526-8403  
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### Sizing Report

Sizing Information for:  
Ray Metcalf-Generator  
1160 Fred McArtan Lane  
Bunn Level, NC 28323

Rated Nominal Voltage                    240  
Generator Fuel Choice                    Propane  
Sizing Method (NEC 220)                Part IV  
(Part III required for selected circuit implementation, Both valid for whole house)

General Lighting & Receptacles		Load (kW)
Square Footage Being Covered (ft <sup>2</sup> )	3000	9
Small Appliance Circuits (20 amps)		
Kitchen Circuits	2	3
Laundry Circuits	1	1.5

Fixed-In-Place Appliances & Motors	Managed Loads	Estimated (kW)	Nameplate (amps)	240 V	Load (kW)
Dryer	X	5.5		X	0.0
Microwave		1.3			1.3
Cook Top		3.0		X	3.0
Oven	X	5.0		X	0.0
Water Heater		5.0		X	5.0
Dishwasher		1.5			1.5
Freezer		0.8			0.8
Refrigerator		0.8			0.8
Well Pump		1.5			1.5
Freezer		0.8			0.8
Refrigerator		0.8			0.8
Freezer		0.8			0.8

Air Conditioning & Cooling	Managed Loads	Estimated (kW)	Nameplate (amps)	240 V	Load (kW)
3.0 Ton Unit		3.0		X	3.0

Heating & Heat Pumps	Managed Loads	Estimated (kW)	Nameplate (amps)	240 V	Load (kW)
Heat Pump Electric Element		5.0		X	5.0

Transient Requirement	Estimated (LRA)	Actual (LRA)	Utilized (LRA)
Largest Motor's Starting Amps (LRA)	86	0	86
Summary NEC Load	Load (kW)	NEC Required	
General Lighting & Receptacles	13.5		
Fixed-in-Place Appliances & Motors	16.3		
Sum of all General Loads	29.8	17.9	
Cooling	3	3	
Heating (w/demand factors)	5	3.3	
Larger of Heating & Cooling	5	3.3	
Sizing based on requirements of NEC Article 220, Part IV		21.2	
Elevation		0 ft	
Minimum size generator for motor starting requirements		11	
BTU load required		350000	

22 kW Generac Model Generator Recommended