



THE REGULATOR COMPRISES A MOTOR-DRIVEN VARIABLE AUTOTRANSFORMER, THREE BUCK-BOOST FIXED RATIO TRANSFORMERS AND A SOLID STATE CONTROL UNIT THAT AUTOMATICALLY POSITIONS THE AUTOTRANSFORMER TO HOLD THE OUTPUT VOLTAGE CONSTANT.

**SPECIFICATIONS:**

WAVEFORM DISTORTION	- - - - -	ZERO
FREQUENCY RANGE	- - - - -	57 HZ TO 63 HZ
ACCURACY	- - - - -	±1%
INTERNAL IMPEDANCE	- - - - -	LESS THAN 1%
CORRECTION RATE	- - - - -	13 VOLTS/SECONDS
PHASE SHIFT	- - - - -	NEGLIGIBLE
EFFICIENCY	- - - - -	99% TYPICAL
TEMPERATURE RANGE	- - - - -	0°C (32°F) TO +40°C (104°F)

**WIRE RANGES FOR CUSTOMER WIRING:**

INPUT/OUTPUT/NEUTRAL TERMINALS: (1) (350MCM-#6 AWG) COMPRESSION PER PHASE  
 GROUND TERMINAL: (1) (1/0-#14 AWG) COMPRESSION

**CONTROLS:**

- CONTROLLER ON/OFF SWITCH: THIS SWITCH TURNS OFF POWER TO THE CONTROLLER ONLY.
- SET POINT ADJUSTMENT: THIS POTENTIOMETER CONTROL IS ROTATED CLOCKWISE TO INCREASE OUTPUT VOLTAGE SET POINT AND COUNTERCLOCKWISE TO DECREASE THE OUTPUT VOLTAGE SET POINT.
- VOLTMETER: THE ANALOG VOLTMETER INDICATES THE REGULATED OUTPUT VOLTAGE.
- RAISE/LOWER SWITCH: THIS SWITCH IS LOCATED INTERNALLY AND IS ACCESSIBLE FROM THE FRONT VIA THE REMOVABLE ACCESS PANEL. THE SWITCH ALLOWS FOR REGULATOR TO BE MANUALLY CONTROLLED.

\* AT NOMINAL OUTPUT VOLTAGE INPUT VOLTAGE RANGE SHIFTS PROPORTIONALLY WITH OUTPUT VOLTAGE SETTINGS.

THREE PHASE (SINGLE LINE CONTROL) 60 HZ			
OUTPUT VOLTAGE (ADJUSTMENT)	INPUT VOLTAGE RANGE *	MAXIMUM OUTPUT AMPERES	RATED OUTPUT (KVA)
220Y/127	176-242	130	50

  

UNLESS OTHERWISE SPECIFIED, TOLERANCE IS #	DECIMALS	Holes	ANGLES	DRAFT	UNITS	TITLE
.XX	.12	.002	1°	1-1/2°	IN [mm]	SPEC. CONTROL DRAWING
XXX	.005					AUTO. VOLTAGE REGULATOR
						TYPE: AVR-25WCSY050
MATERIAL:						STACO ENERGY PRODUCTS CO. A COMPONENTS CORPORATION OF AMERICA COMPANY DAYTON, OHIO U.S.A.
DRAWN BY		DATE	FIRST USED ON	DO NOT SCALE DWG.	CUSTOMER APPROVAL	
TIM RAU		11/1/00				
CHECKER		DATE	WEIGHT APPROX.	CODE IDENT. NO.	DWG. SIZE	DWG. NO.
				83008	D	095-3113
ENGINEER		DATE	SCALE	SHEET 1 OF 2		
			.2=1			