



# TECHNICAL DATA

A division of Spectrum Organic Products, Inc

Product Name: **White Grain Vinegar, Organic**  
 Raw Material: Organic ethanol produced by fermentation  
 Manufacturing: Fermentation of organic ethanol with *Acetobacter aceti*

Produced by the submersed fermentation of rye or maize-corn into ethanol, then acetic fermentation to vinegar. Spectrum Ingredients' Organic White Grain Vinegar, often referred to as White Distilled Vinegar, is the solution to the requirement of organic vinegar without the associated flavors found in wine and cider vinegars.

<u>Property</u>	<u>Typical Analysis</u>	<u>Method</u>
Appearance	Clear no sediment	Observation
Organoleptic	Acetic acid bite	Sensory Evaluation
Color	None to light yellow	Observation
Grain	120	AOAC Standard Methods
Acidity %	12%	AOAC Standard Methods
Density @ 20°C	8.45 lbs/gal	AOAC Standard Methods
Residual Alcohol	0.5%	AOAC Standard Methods
Esters (as Ethyl Acetate)	1,000 ppm	AOAC Standard Methods
Sulfur (as SO <sub>2</sub> )	25 ppm	AOAC Standard Methods
Copper	5.0 ppm	AOAC Standard Methods
Iron	10.0 ppm	AOAC Standard Methods
Lead	0.1ppm	AOAC Standard Methods

### Microscopic Examination (10X)

Negative for insect fragments  
 Negative for vinegar eels  
 Negative for vinegar mother

### Microbiology

FDA BAM 8<sup>th</sup> Ed, 1998

TPC	<200/ml
Yeast & Mold	<10/ml
Coliforms	<10/ml
E. coli	Negative/10ml
Salmonella	Negative/100ml
S. aureus	Negative/10ml

**Packaging and Storage:** Store in a cool dry place (50 to 68 degrees F optimum) away from direct sources of sunlight, heat and oxidizers. Properly stored unopened containers have an expected shelf life of 24 months.

<u>Item Number</u>	<u>Size</u>	<u>Container Description</u>
305200	57.1 Gal	Plastic drum, approximately 483 lbs net weight

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