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MT-PMUT-R7-1P-GMJ-50KVA-SZ-LT-DF-A6-BB-CS-2B4-M1

50 KVA Submersible Distribution Transformer, Vault Mount - 20900Y/12067 Wye Primary, 240/120V Secondary - Biodegradable Fluid /KNAN 304 Stainless

Product ID: 302512



Larson Electronics LLC manufactures a wide variety of products, including custom built to spec designs. The pictures displayed for this unit are a general representation of form factor for the product line and may not accurately represent this exact configuration in every detail due to custom builds and changes between similar products in our standard catalog. The specifics for this configuration are listed in the specification table and supporting documentation (CAD files, Dimensional Drawing, Name Plate Diagram, Wiring Diagram, etc.). This means that specific details (receptacles, plugs, wires, connections, mounting brackets, external finishes, etc.) may not be accurately represented in images vs specifications. Please review specifications and do not order based solely on images.

MT-PMUT-R7-1P-GMJ-50KVA-SZ-LT-DF-A6-BB-CS-2B4-M1 1-Wire 1PH Submersible Vault Distribution Transformer

Transformer Type: Submersible Vault Distribution Transformer
Transformer Configuration: Underground Vault Installation, Suitable for Temporary Submersion
Transformer Feed Type: Loop Feed
Phase: Single Phase
Capacity: 50
Primary Voltage: 20900Y/12067
Primary Phasor: Wye
Primary BIL: 95 KV
Secondary Voltage: 240/120V (L-N-L)
Secondary Phasor: Dual Winding Single Phase
Secondary BIL: 30 KV
Frequency: 60 Hz
Temperature Rise: 65°C
Cooling Class: KNAN; Self-Cooled
Forced Air (Fans): None
Tap Changer: 5-position Tap Changer
Tap Qty: (2) FCAN Taps Above, (2) FCBN Taps Below
Tap %: 2.5%
Impedance: 1.0-4.5%
Primary Connection Type: Dead Front
Primary Termination: Standoff Well Bushings w/ Removable Studs, 200A Load Break Elbows w/ Inserts
Primary Connection Qty: (4) Primary Connections for use w/ Elbow Connectors
Primary Parking Stand Qty: (2) Welded Bracket for Installing Accessory Parking Stand Bushings
Primary Surge Arrestors: (1) High Voltage Elbow Surge Arrestors, Included

Ratings

Meets/Exceeds DOE 2016 Efficiency Ratings
Complies with ANSI / IEEE #C57.12.00
Complies with ANSI / IEEE #C57.12.25
Complies with ANSI / IEEE C57 12.28
Complies with ANSI / IEEE C57 12.38
Complies with ANSI / IEEE C57.12.70
Complies with ASTM D3487
Pentahead Entry Assembly
High-Fire Point Natural Ester Insulating Fluid
Non-PCB Insulating Fluid
Tamper Proof Housing
Lift Up Pad lockable Lid
100% Stainless Steel Construction, Corrosion Resistant

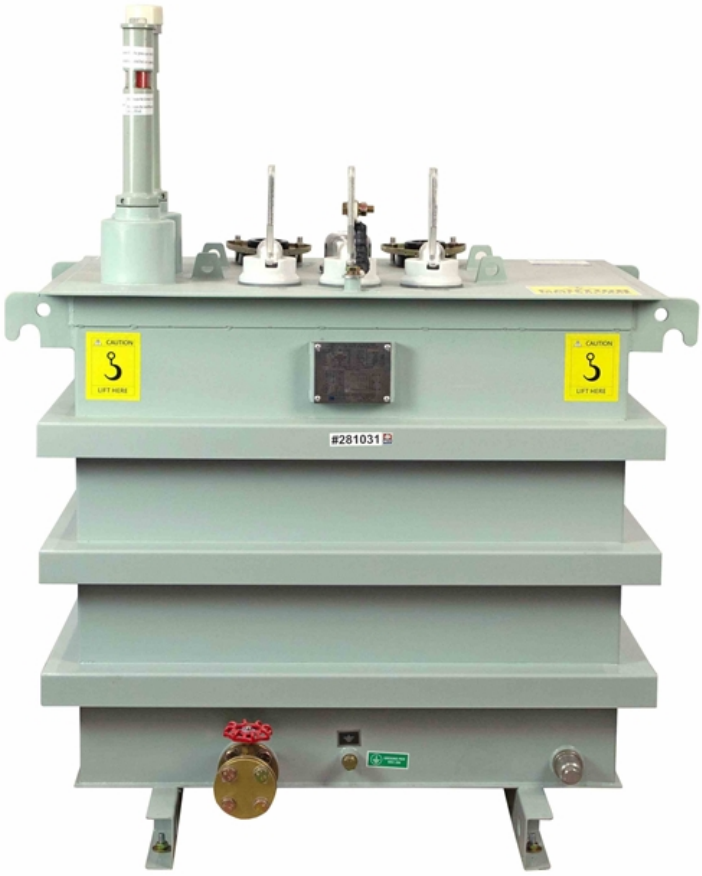
Efficiency: 98.90%
No Load Loss (in watts)*: 176W
Load Loss (in watts)*: 650W
Total Load Loss (in watts)*: 826W

Primary Surge Arrestor Voltage Rating: 30 kV Class
Primary Surge Arrestor MCOV Rating: 24.4 kVrms
Primary Neutral Connection: N/A
Primary Grounding Provisions: (1) Grounding lug, accepts #2 copper
Secondary Connection Type: Live Font
Secondary Connections: Threaded Stud Terminals
Secondary Connection Qty: (3)
Secondary Grounding Provisions: (1) Grounding lug, accepts #2 copper
Transformer Protection: Bayonet Fuse
Load Break Switch: (1) 4-Position Load Break Switch
Efficiency: Meet DOE 2016 Standard
Insulation Fluid: Biodegradable Natural Vegetable Oil Ester Insulating Fluid - Non-PCB Fluid
Fluid Capacity*: 110 Gallons
Liquid Level Indicator: Analog Gauge
Temperature Indicator: Analog Gauge
Pressure/Vacuum Indicator: Analog Gauge
Pressure Relief Device: Included, Automatic Action
Fill Valve: Included
Drain Valve: Included, w/ Sampler
Surge Arrestors: N/A
Front: Dead Front Primary, Live Front Secondary
Winding Material: Copper
Ambient Temperature Rating: 40°C
Sound Level: 51 dBA
Elevation (Altitude): 3300ft (1000 meters) Above Sea Level
Tank Material: 304 Stainless Steel
Cabinet Material: 304 Stainless Steel
Base Platform Material:304 Stainless Steel
Housing Type: Tamper Resistant w/ Pad-lockable Lift-up Lid
Paint Type: Munsell Green Paint and Undercoating
Finish Color: Munsell 7.0 GY 3.29/1.5 Bell Green
Mounting: Submersible Distribution Transformer, Vault Mount
Conduit Opening: -
Dimensions*: 33" x 32" x 24"
Weight*: 800 lbs
*Please note that numbers are approximate and subject to change

Special Orders - Special Requirements
Contact us for special requirements
Toll Free: 1-800-369-6671
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The MT-PMUT-R7-1P-GMJ-50KVA-SZ-LT-DF-A6-BB-CS-2B4-M1 from Larson Electronics is a Submersible Vault Distribution Transformer that offers powerful, reliable, and efficient power distribution in outdoor and public locations. The low operating costs, low heat emissions, and low cost of ownership makes this transformer ideal for a wide range of applications and businesses. This submersible vault power distribution system is designed for underground installation in concrete vaults where flooding may happen and the transformer may be temporarily submerged.
PLEASE NOTE: ANY FREE SHIPPING OFFERS DO NOT APPLY TO POWER DISTRIBUTION PANELS, TRANSFORMERS, OR SUBSTATIONS*
Transformer Features: With a transformer rating of 50 kVA, the industrial transformer features a primary voltage of single-phase 20900Y/12067 Wye and a secondary voltage of single-phase 240/120V (L-N-L). The unit has a primary loop feed and dead-front primary connections. We also offer systems with radial feed and dead front primary/live front secondary connections. This transformer features a 5-position tap changer with (2) +/- 2.5% taps above and (2) +/- 2.5% taps below to allow small changes for voltage. This pad mount transformer features primary well bushings and standard spade connectors on the secondary side. Equipped with copper windings, this transformer consists of one coil and two core loops.
The MT-PMUT-R7-1P-GMJ-50KVA-SZ-LT-DF-A6-BB-CS-2B4-M1 is air cooled and does not have fans or mounting provision for fans. This unit features a 65°C temperature rise for reduced heat waste, increased reliability and longer life. The transformer meets DOE 2016 efficiency standards. The combination of low temperature rise and high efficiency makes this unit suitable for use in electrical rooms, air conditioned spaces in buildings, underground vaults and similar

locations, in addition to outdoor areas, The submersible design makes this unit suitable for use in concrete vaults where flooding may occur or in other areas where the transformer may be temporarily submerged such as underground.
Insulation Fluid: The MT-PMUT-R7-1P-GMJ-50KVA-SZ-LT-DF-A6-BB-CS-2B4-M1 features biodegradable cooling fluid (KNAN) that is comparable to FR3 fluid. We offer transformers with mineral oil fluid, if needed.
Biodegradable Fluid: Biodegradable cooling fluid (vegetable oil) has a higher heat capacity compared to mineral oil, making the liquid safer to use and more reliable during operations. Vegetable oil has a higher flash point and fire point than mineral oil, hydrocarbon oil, silicone oil and synthetic ester. This cooling fluid is also non-toxic and can tolerate higher breakdown voltages than mineral oil. When operating at high temperatures, biodegradable cooling liquid sustains up to 120% loan conditions, which helps preserve the transformer's lifespan and performance.
Gauges: The following gauges are included with the system: liquid level, temperature and pressure/vacuum gauges. Standard liquid level, temperature and pressure/vacuum gauges are analog, manual reading types. These gauges do not have auxiliary contacts.
Fault Pressure Devices: This transformer features an automatic action fault pressure device. Fault pressure devices are used to detect high rates of pressure rise within the tank.
Rapid Rise Relay: There are no rapid rise relays on the unit. This safety component is designed for protection when a rapid increase in tank pressure occurs. The relay is suitable for detecting sudden pressure fluctuations above predetermined safe limits.
Surge arresters: This system comes with high elbow surge arresters on the primary side. Designed for over-voltage and transient voltage protection, the components prevent damage caused by lightning, internal switching or voltage surges. We can offer models without high elbow surge arresters that have mounting provisions for customer-provided surge arresters.
Load Breaker Switch: The MT-PMUT-R7-1P-GMJ-50KVA-SZ-LT-DF-A6-BB-CS-2B4-M1 is equipped with a load break switch. This switch has four positions: A side on + transformer on, B side on + transformer on, A and B sides + transformer on, and A and B sides + transformer off.
Valves: The MT-PMUT-R7-1P-GMJ-50KVA-SZ-LT-DF-A6-BB-CS-2B4-M1 is equipped with a fill valve and drain valve with sampler port.
Protection Fuses: This transformer contains bayonet protection fuses on the primary side. For units without protection fuses, up stream protection is provided. We recommend provisions for protection fuses when possible, as blown fuses may require more frequent oil changes.
Mount: The heavy-duty enclosure makes the unit suitable for underground applications such as concrete vaults where flooding may occur. This submersible vault distribution transformer can be floor mounted.
Benefits: The MT-PMUT-R7-1P-GMJ-50KVA-SZ-LT-DF-A6-BB-CS-2B4-M1 pad mount transformer offers many benefits to consumers. This transformer provides owners with significant energy savings, as well as offering environmental benefits. Higher efficiency not only extends the life of the transformer, but also turns into cost savings for owners in the form of lower energy bills and decreased cost of ownership.
Applications: Underground installation applications, such as concrete vaults, where the transformer may be temporarily submerged due to flooding.
Larson Electronics is a manufacturer and as such can build stationary and portable transformer systems to your specifications. Although we carry several models of power distribution transformer systems, we can deliver custom ordered units almost as quickly as our prebuilt units. If this model does not meet your needs, please contact us at 1-800-369-6671 or sales@larsonelectronics.com to discuss your specific requirements.


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Tapping switch
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Frequently Asked Questions (FAQ)