



VER-T-POL CATALOG

Oklahoma Design Technologies

PO Box 166, Lawton Oklahoma 73502

580-355-1855 Office/Fax * 580-704-3473-Mobile

www.oklahomadesigntech.com * Poolaw@oklahomadesigntech.com

June, 2024

Oklahoma Design Technologies, LLC
Safety is our #1 Priority.



PATENTED



The VER-T-POL is a patented product and is certified by a Professional Engineer to support 21 tons (42,000 pounds) working load. It is our professional opinion that by installing the VER-T-POL on your job site, you are acting in the best interest of safety for your employees, as well as increasing your productivity and saving your company money.

The VER-T-POL is the only portable mechanical aluminum device in the world that is professionally certified to support an object weighing up to 21 tons (working load) in a vertical position for an extended period of time.

A Major factor is the ability to install/remove VER-T-POL portable supports in blind easement situations where a line or boom truck is not accessible. One to two men required for installation (15 minutes) & removal (10 Minutes). For public and company safety, VER-T-POL portable structure supports should become one of your standard safety tools. Pole supports can be used for multiple purposes. Their low cost, easy installation and ability to be used over and over again have made them preferred by utility, municipal and construction companies.

What it boils down to is three items: safety, cost savings and customer reliability, something the VER-T-POL can easily supply. **System meets/exceeds ANSI & OSHA requirements and is certified by a Professional Engineer.**

Ver-T-Pol w/accessories (complete unit)	VTP
Accessories for Ver-T-Pol (2 replacement chains, 2 ratchet binders, 3 straps, 11 each 5/8" pins & 2 bags)	VTP-ACC

VER-T-POL USES

- Support broken & damaged transmission and distribution poles
- Support poles being excavated around
- Train cables for underground electrical systems
- Support dead end pole where anchor & down guy needs to be Temporarily moved/removed
- Erect/replace poles (where large equipment cannot gain access)
- Storm recovery (to restore electrical & phone service to customers)
- Erect/stabilize beam supports for new construction on steel buildings
- Use the adaptor section to splint a broken utility pole when a vehicle has crashed into it. Restores power quickly and easily

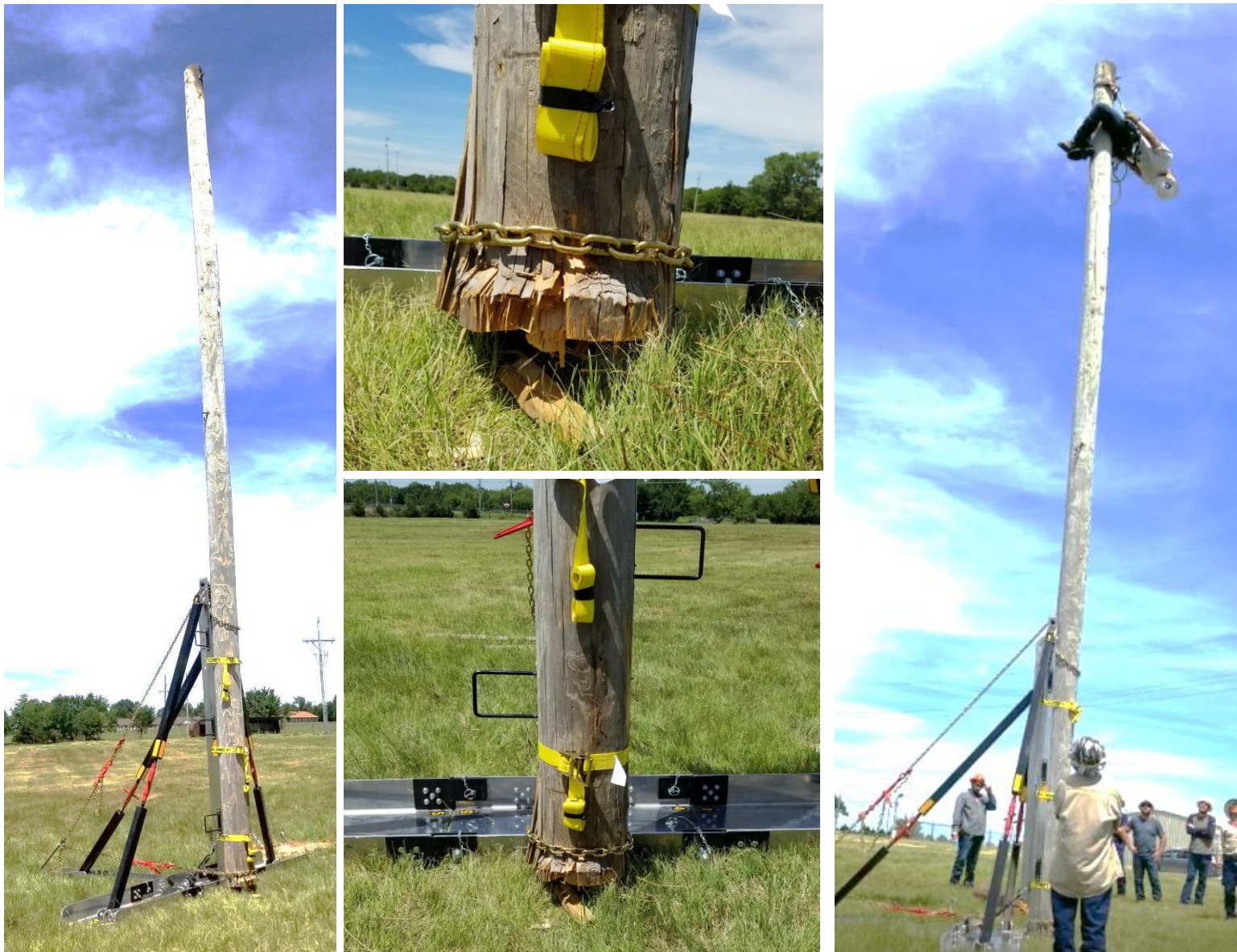
**Live pole change out
using the VER-T-POL**



During a VER-T-POL demonstration at a lineman climbing school, a broken pole was strapped to the Ver-T-Pol at about 8" off the ground. The purpose of the demonstration was to show how stable the pole is when it is held up solely by the VER-T-POL. When a pole has rotted off below ground or broken above ground, the VER-T-POL can be used to support the pole to provide a safe environment for climbing.

A lineman climbed the pole to show how safe it is to climb and gave a whole new meaning to "pole dancing". This lineman had total trust in his equipment!

Call us to set up a demonstration for your company – 580-704-3473.



The VER-T-POL in use:



The VER-T-POL has been “put to the test” by the following companies:

TXU, McKinney Texas



Xcel Energy, Denver Colorado



Pole attached to free standing Ver-T-POL

Pole is 6" off the ground

Using 2 Ver-T-Pols with only 2 legs on each unit

Ocala Electric Utility, Ocala Florida



Removing sand from underneath base

Ver-T-Pol base floating

Base completely exposed

Pole butt free floating

The VER-T-POL supporting broken poles:



VER-T-POL™

Product Information

COST SAVING PURPOSES:

- Not having to relocate pole, due to excavation and trenching near pole.
- Overtime, not having to replace broken or rotted pole on overtime.
- Safety, not knowing if pole is safe to climb, due to pole rotted off below ground line.
- Allowing Engineer to concentrate on more productive jobs, instead of designing line to be relocated and moved back to original location after construction of underground facilities.
- To keep damage claims to a minimum.
- Help keep SAIDI and CAIDI values to a minimum.
- After damaging storms, installing pole supports allows construction crews to do more productive work by concentrating on higher customer outage areas.
- To help minimize liabilities and law suit related to extended exposure of using a line truck to hold pole.

USAGE:

- For supporting a pole, when construction or maintenance of underground facilities are near or under pole.
- For stabilizing a broken pole.
- For helping set a pole when no motorized vehicle can set a pole.
- For holding a deadend pole when downguys have to be temporarily removed for construction.
- Can be used in downtown underground network, to help train/guide underground cables into manholes.
- Can be used to support bridge columns, traffic signal poles, walls, beams or anything vertical.
- Can be used for rescue in emergencies in earthquake prone areas.
- Pole support can be modified for many other usages; other than supporting a pole.

TESTING:

- Pole supports have been field tested for sixteen years.
- There have not been any personal injuries recorded.
- No liability or damage claims have been filed toward the pole support.
- Some examples of poles held by the VER T POL pole support:
 - 25' distribution through 80' transmission poles
 - Tangent 50' pole with 3-167kVA transformers and 3-phase 477ACSR conductors.
 - Running 45' angle pole with 1-75kVA transformer, with downguys removed.
 - Numerous junction poles with large telephone and cablevision trunk cables.

POLE SUPPORT SPECS:

- Constructed out of high tensile aluminum and steel.
- Designed to support 42,000 vertical pounds.
- Constructed using pins/rods to be quickly assembled and disassembled in the field.
- Designed to be maintenance free and to be easily upgraded.
- Chains are 5/16", high-grade (70,000 lbs.), steel construction.
- Hooks are high-grade (70,000 lbs.) steel construction.
- Recommended installation of anchor is 1' behind center base plate, no further than 4'.
- Top support chain attached to pole, roughly 5' from ground level.
- Bottom tension chain to be attached roughly 2' above ground level.
- Chains and 3" nylon straps to be used when excavation near or around pole.
- One rap of nylon strap will hold 15,000 lbs.; two raps will hold 30,000 lbs.
- For rotted or broken poles, chains and anchor will not be required. Two 3" straps are required (drive bars can be driven into the end of each leg in the pre-punched holes).
- The heaviest piece weighs 70 lbs. The complete unit weighs 550 lbs.

Unit comes complete and ready to install.



OSHA[®] FactSheet

Cranes and Derricks in Construction Final Rule

The U.S. Department of Labor's Occupational Safety and Health Administration (OSHA) released a historic new standard, addressing the use of cranes and derricks in construction and replacing a decades old standard. The significant number of fatalities associated with the use of cranes and derricks in construction and the considerable technological advances in equipment since the publication of the old rule, issued in 1971, led the Labor Department to undertake this rulemaking.

In 1998, OSHA's expert Advisory Committee on Construction Safety and Health (ACCSH) established a workgroup to develop recommended changes to the current standard for cranes and derricks. In December 1999, ACCSH recommended that the Agency use negotiated rulemaking to develop the rule. The Cranes and Derricks Negotiated Rulemaking Committee (C-DAC) was convened in July 2003 and reached consensus on its draft document in July 2004. In 2006, ACCSH recommended that OSHA use the C-DAC consensus document as a basis for OSHA's proposed rule, which was published in 2008. Public hearings were held in March 2009, and the public comment period on those proceedings closed in June 2009.

- The rule becomes effective 90 days after August 9, 2010, the date the final rule was published in the *Federal Register*. Certain provisions have delayed effective dates ranging from 1 to 4 years.
- The final rule was published on August 9, 2010 by the Federal Register, and can be found at http://www.osha.gov/FedReg_oshapdf/FED20100809.pdf.
- A copy of the regulatory text is available at: <http://www.osha.gov/doc/cranesreg.pdf>
- This new standard will comprehensively address key hazards related to cranes and derricks on construction worksites, including the four main causes of worker death and injury: electrocution, crushed by parts of the equipment, struck-by the equipment/load, and falls.
- Significant requirements in this new rule include: a pre-erection inspection of tower crane parts; use of synthetic slings in accordance with the manufacturer's instructions during assembly/disassembly work; assessment of ground conditions; qualification or certification of crane operators; and procedures for working in the vicinity of power lines.
- This final standard is expected to prevent 22 fatalities and 175 non-fatal injuries each year.
- Several provisions have been modified from the proposed rule. For example:
 - Employers must comply with local and state operator licensing requirements which meet the minimum criteria specified in § 1926.1427.
 - Employers must pay for certification or qualification of their currently uncertified or unqualified operators.
 - Written certification tests may be administered in any language understood by the operator candidate.
 - When employers with employees qualified for power transmission and distribution are working in accordance with the power transmission and distribution standard (§ 1910.269), that employer will be considered in compliance with this final rule's requirements for working around power lines.
 - Employers must use a qualified rigger for rigging operations during assembly/disassembly.
 - Employers must perform a pre-erection inspection of tower cranes.
- This final rule requires operators of most types of cranes to be qualified or certified under one of the options set forth in § 1926.1427. Employers have up to 4 years to ensure that their operators are qualified or certified, unless they are operating in a state or city that has operator requirements.
- If a city or state has its own licensing or certification program, OSHA mandates compliance with that city or state's requirements only if they meet the minimum criteria set forth in this rule at § 1926.1427.
- The certification requirements in the final rule are designed to work in conjunction with state and local laws.
- This final rule clarifies that employers must pay for all training required by the final rule and for certification of equipment operators employed as of the effective date of the rule
- State Plans must issue job safety and health standards that are "at least as effective as" comparable federal standards within 6 months of federal issuance. State Plans also have the option to promulgate more stringent standards or standards covering hazards not addressed by federal standards.

OSHA is making this document, the regulatory text, available for informational purposes only. This action does not affect the effective date of the final rule on Cranes and Derrick in Construction, which will be 90 days after August 9, 2010, the date the final rule will be published in the *Federal Register*. Until the date of publication, this full rule, including the preamble, can be found at <http://www.ofr.gov/inspection.asps>. After publication the rule can be found at the Federal Register at www.osha.gov.

- (1) Where the manufacturer procedures are unavailable, the employer must develop and ensure compliance with all procedures necessary for the safe operation of the equipment and attachments.
- (2) Procedures for the operational controls must be developed by a qualified person.
- (3) Procedures related to the capacity of the equipment must be developed and signed by a registered professional engineer familiar with the equipment.

(c) *Accessibility of procedures.*

- (1) The procedures applicable to the operation of the equipment, including rated capacities (load charts), recommended operating speeds, special hazard warnings, instructions, and operator's manual, must be readily available in the cab at all times for use by the operator.
- (2) Where rated capacities are available in the cab only in electronic form; in the event of a failure which makes the rated capacities inaccessible, the operator must immediately cease operations or follow safe shut-down procedures until the rated capacities (in electronic or other form) are available.

(d) The operator must not engage in any practice or activity that diverts his/her attention while actually engaged in operating the equipment, such as the use of cellular phones (other than when used for signal communications).

(e) *Leaving the equipment unattended.*

(1) The operator must not leave the controls while the load is suspended, except where all of the following are met:

- (i) The operator remains adjacent to the equipment and is not engaged in any other duties.**
- (ii) The load is to be held suspended for a period of time exceeding normal lifting operations.**
- (iii) The competent person determines that it is safe to do so and implements measures necessary to restrain the boom hoist and telescoping, load, swing, and outrigger or stabilizer functions.**
- (iv) Barricades or caution lines, and notices, are erected to prevent all employees from entering the fall zone. No employees, including those listed in §§ 1926.1425(b)(1) through (3), § 1926.1425(d) or § 1926.1425(e), are permitted in the fall zone.**

(2) The provisions in § 1926.1417(e)(1) do not apply to working gear (such as slings, spreader bars, ladders, and welding machines) where the weight of the working gear is negligible relative to the lifting capacity of the equipment as positioned, and the working gear is suspended over an area other than an entrance or exit.

PAUL W. BRUNE, P.E.
STRUCTURAL / CIVIL ENGINEER

1720 N.W. KINYON
LAWTON, OK 73507

580-355-1690 • (FAX 355-5006)

September 17, 2002

Billy Poolaw
Oklahoma Design Technologies, LCC
P O Box 724
Elgin OK 73538

Re: Pole Support Bracket Structural Capacity Analysis

The structural capacity of the temporary pole support is as follows:

Vertical load capacity 42,000 pounds
(rigged per instructions)

Lateral load capacity to excavation 13,500 pounds
(point load applied at top of support)

Lateral load capacity perpendicular to excavation 13,000 pounds
(point load applied at top of support)

Sincerely,



Paul W. Brune, PE
PWB/ra

LARGE EQUIPMENT & FURNITURE (> \$1,000) – REQUEST FORM

FY: 2012 RA: 206 Submitted By: Electric System Integrity

Item Requested: Three (3) "Ver-T-Pole" assemblies Cost: \$24,300

Describe planned use for item: Equipment will be utilized to hold electric distribution and small transmission poles in place as excavations are being performed within approx. 1 to 6 feet of pole base.

Is this a replacement for existing? Yes ☐ No ☒ If Yes, please provide support, i.e., age of existing, condition, design change, safety upgrade, etc:

Is this item a new process requirement? Yes ☐ No ☒ If Yes, please provide a brief justification, i.e., process change, safety, etc:

There is benefit to create a new process requirement using this equipment. When excavations are being performed near LBWL utility poles, LBWL is required to temporarily relocate poles and permanently replace them when work requires more than one day too complete. For one day excavations, LBWL is required to support the pole with a Digger/Derrick truck for the duration of the work. The "Ver-T-Pole" installs on an existing pole (in approx. 15 to 20 minutes) and supports the pole during the excavation process. It is a reusable piece of equipment.

Will purchasing this item save money? Yes ☒ No ☐ If Yes, please explain, i.e., increased productivity, projected O & M reductions, etc:
Projected O&M Savings;

(Completed) FY 2011 CSO 034B – Sketch #52044 – Permanent Riser Pole Relocation at National Guard facility; total cost to LBWL = \$28,793.59. One "Ver-T-Pole" @ \$8,100 + \$350 (labor & vehicle) = \$8,450. Potential for cost savings = \$20,343.59 and undamaged "Ver-T-Pole" would be reused.

(Future) FY 2011 CSO 015N ~ Sycamore – Temporary relocation and permanent restoration of two distribution poles – Project Estimate = \$44,350.00. Two "Ver-T-Poles" @ \$16,200.00 + 700 (labor & vehicle) = \$16,900.00. Potential for cost savings = \$27,450.00 and undamaged "Ver-T-Poles" would be reused.

Approximately how many times will this item be used each fiscal year? 3

Can this item be rented at a lower life cycle cost? Yes ☐ No ☒

Would used or surplus items be acceptable? Yes ☐ No ☒

Do other Departments have this item available to share? Yes ☐ No ☒

Manager Approval: _____ Date: _____
Director Approval: _____ Date: _____
Executive Director Approval: _____ Date: _____

LANSING BOARD OF WATER AND LIGHT
Lansing, Michigan

Revised: 11-23-10



City of Lawton

Sewer Construction Division

E-mail: cityof.lawton.ok.us
Telephone 580-581-3405
Fax 580-581-3407

Mailing Address: 103 Southwest 4th Street
Shipping Address: 2100 South 6th Street
Lawton, Oklahoma 73501

June 15, 2001

Mr. Billy E. Poolaw
Oklahoma Design Technologies, LLC
PO Box 724
Elgin, Oklahoma 73538

Re: Pole Braces

Dear Mr. Poolaw:

This letter is an attempt to put in writing the success that the aluminum pole braces have gained in numerous occasions where they have been used in the City of Lawton where sanitary sewer rehabilitation is under construction.

The City of Lawton in-house crews started construction in March of 1999 and as of this date have installed approximately 60,000 lf of new sanitary sewer mains from 8 inch to 36 inch diameter. In numerous locations, work was around existing poles that could not be moved, but had to be braced with the aluminum brace to allow excavation to take place. In some of these areas, the sewer main was 12 to 15 feet in depth and without the pole being braced, the pole and attached lines would have been damaged or destroyed.

In all cases that have been excavated with the aluminum pole brace in use, there has been no evidence of any movement to the pole structure, even when the excavation has been completely under the pole.

We will continue to request the use of these braces in all areas where excavation is threatening the pole stability.

Sincerely,

A handwritten signature in black ink, appearing to read "Roger L. Bridges".

Roger L. Bridges, P.E.
City of Lawton
SSTD Division

INTRODUCING THE NEW VER~T~POL TRAILER



The Ver-T-Pol Trailer was developed to fill a need for a versatile all terrain, low profile trailer that has many different uses.

Specifications:

- Versatile: Adjustable 3" eye tow hitch and ball hitch
- 38" tow chains with 3/8" slip hook
- Heavy duty square tube side wind jack
- 205/65-10 bias trailer tires with 10" galvanized wheel
- Removable/adjustable tail lights
- 16 heavy duty D rings for strap attachment points
- 8,000 pound tandem trailer axle suspension & 1.75 heavy duty square axle spindles

Suggested Uses:

- All terrain, low profile to enable use in muddy or swampy areas. The 8 tires enable the trailer to float.
- Pull the trailer on the highway, in town or mountainous areas.
- Ability to install removable side boards and has waterproof hubs.
- Trailer can be used for confined space entry or as a pulling rig to pull wire.
- Carries up to 9 Ver-T-Pols, transport materials and large equipment, like a skid steer loader.
- Rated for 30,000 pounds, contains built in heavy duty D rings to easily secure the cargo with straps.
- Designed to be low to the ground for ergonomics, only 1' taller than the ground when parked next to a curb.



When comparing costs on different types of anchors, the entire cost to install the anchor should be considered. The ergonomic impact on the employee should also be considered for the bust anchor compared to the SAF-T-ANCHOR. Using the work order example below can provide the buyer with an estimated total overall cost for installation.

WORK ORDER EXAMPLES				WORK ORDER EXAMPLES			
ANCHOR INSTALLATION - OTHER TYPE ANCHORS				ANCHOR INSTALLATION - ODT SAF-T-ANCHORS			
ITEM DESCRIPTION	COST	HOURS TO INSTALL	TOTAL COST	ITEM DESCRIPTION	COST	HOURS TO INSTALL	TOTAL COST
MATERIALS				MATERIALS			
Anchor - 8" Bust	\$100.00		\$100.00	STAD55432-N-3/4	\$100.00		\$100.00
EQUIPMENT (cost per hour w/overheads)				EQUIPMENT (cost per hour w/overheads)			
Digger Derek Truck	\$150.00	3	\$450.00	Impact Drill	\$10.00	1	\$10.00
Truck	\$65.00	3	\$195.00				
Shovels	\$2.00	3	\$6.00				
Tamp	\$2.00	3	\$6.00				
LABOR (cost per hour with benefits)				LABOR (cost per hour with benefits)			
Crew Leader	\$50.00	3	\$150.00	Crew Leader	\$50.00		
Lineman #1	\$45.00	3	\$135.00	Lineman #1	\$45.00		
Lineman #2	\$40.00	3	\$120.00	Lineman #2	\$40.00	1	\$40.00
Lineman #3	\$35.00	3	\$105.00	Lineman #3	\$35.00	1	\$35.00
TOTAL COST			\$1,267.00	TOTAL COST			\$185.00
Below is an example of the cost difference between holding a utility pole with a derrick truck and the VER-T-POL							
WORK ORDER EXAMPLES				WORK ORDER EXAMPLES			
SUPPORTING A POLE - USING A DERRICK TRUCK				SUPPORTING A POLE - USING THE VER-T-POL			
ITEM DESCRIPTION	COST	HOURS POLE HELD	TOTAL COST	ITEM DESCRIPTION	COST	HOURS POLE HELD	TOTAL COST
EQUIPMENT (cost per hour w/overheads)				EQUIPMENT (cost per hour w/overheads)			
Digger Derek Truck	\$150.00	24	\$3,600.00	VER-T-POL	\$20.00	24	\$480.00
*LABOR (cost per hour with benefits)				*LABOR (cost per hour with benefits)			
Lineman #2	\$40.00	8	\$320.00	Lineman #2	\$40.00	2	\$80.00
Lineman #2 - Overtime	\$60.00	4	\$240.00				
Lineman #3	\$35.00	8	\$280.00	Lineman #3	\$35.00	2	\$70.00
Lineman #3 - Overtime	\$52.50	4	\$210.00				
TOTAL COST PER DAY			\$4,650.00	TOTAL COST PER DAY			\$630.00
TOTAL-WEEK (24 hour cost x 7 days)			\$32,550.00	TOTAL-WEEK (24 hour cost x 7 days-VTP only)			\$3,360.00
*OSHA requires trucks to be manned 24/7 while supporting a pole				*Labor costs are for 1 hour set up and 1 hour removal			

All figures used in this example are imaginary, but can be compiled using industry standard daily rental rates or by using your company's actual costs including all overheads and employee benefits. A major point to consider is that the SAF-T-ANCHOR will not deteriorate due to circulating current, saving even more money!