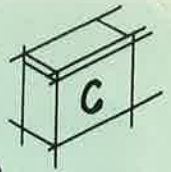




# CAPACITOR ASSEMBLIES



## CAPACITALKS by "CAL"

from Myron Zucker Engineering Company

### THE CAPACITOR TREND

*We don't expect "Capacitors-At-the-Load" ever to make substation racks obsolete — but there is a strong TREND toward using them in high-production plants.*

### WHY CAL?

Because many plants have found it IDEAL to switch capacitors with the loads. There are many specific reasons. No. 1 was discussed in a previous write-up.

### REASON No. 2 — The practice saves engineering time

Once an application table of capacitor kvar vs. motor hp has been adopted, according to simple rules that will be considered in later writings from CAL, the capacitor job becomes routine.

A low-power-factor plant may be brought up to an economical level by use of surplus maintenance funds — applying capacitors to existing "bad-actor" loads (usually lightly-loaded motors) — and by inclusion of capacitors on any new load that may be brought in to the plant. Such improvement may be made by selecting capacitor size for each motor from the table that has been adopted by the plant.

Experience shows that any desired power factor can be maintained by selecting capacitors from preset tables. When power factor reaches a safe margin over the preferred value, the capacitors may be omitted from new equipment if desired (though the fact is that once "CAL" has become established, the advantages are so evident that usually the plant engineer and "management" agree to continue).

No more need for comptroller or plant engineer scrutinizing power bills each month making economic studies of capacitor installations, getting bids to buy and install, preparing requests and justifications for funds, then — months or even years after it should have been done — installing capacitors.

*Capacitor-At-the-Load is planned once, then maybe lightly trimmed as circumstances develop.*

### REASONS No. 3 — No. 15 will follow

### APPLICATION INFORMATION for CAPACITORS-AT-THE-LOAD.

An important detail that saves engineering time is the simple "Specification" type of catalog numbering system used for

**CAPACITOR ASSEMBLIES:** First digit or two shows KVAR. (1/2 is shown by "x"). Next digit shows voltage: e.g., "4" means 480v. Then "3" for 3 phase. Finally, a few letters show the construction: "C" for Can, "T" for Tray, etc., with a few refinements for mechanical arrangement.

How better to save time for the busy engineer or estimator?

## "CAPACITORS CUT THE COST"

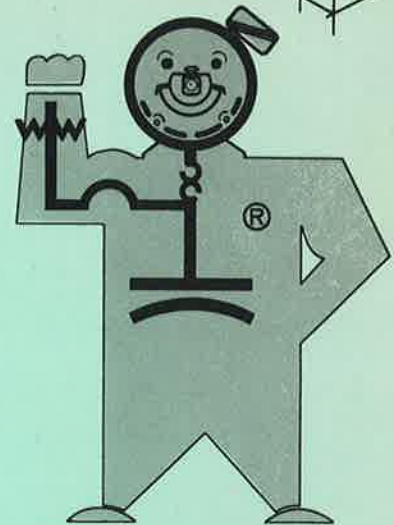
Buy your Power Capacitors from us

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INTRODUCING

"CAL"

By now you have noticed that the initials for Capacitors-At-the-Load are "C-A-L"

This has a meaning: capacitors plus motors make such a strong team — helpful to you and to your electric system — that they develop a personality which we hereby introduce to you: CAL

In fact CAL will write the other articles in this series.

