

- 1 - Understand
- 2 - Purify - pull weeds
- 3 - Grow - provide fertilizer - new seed

First - let's purify  
questions and answers...

Is analyzing of bids VA?	No.	
Is questioning the customer on his real functional needs VA?	No.	
Is getting suggestions from suppliers VA?	No.	
Is analyzing a design for labor & mat'l content VA?	No.	
Is studying mat'ls flow in a plant VA?	No.	
Is naming functions in two words VA?	Yes.	
Is dividing function into basic & second degree VA?	Yes.	
Is assigning appropriate cost, or "value", to a function--i. e., evaluating a function--VE?		
If arrived at by analysis	No.	
If arrived at by comparison	Yes.	
Is applying better processes VE?	No.	
Is studying mat'l substitution VE?	No.	
Is associating costs with functions VE?	Generally Yes	
Does VE work better on high volume items ?	No.	
We used to find a good supplier, then deal almost exclusively with him. Now I insist on 3 bids on everything over \$100. Is that VA?	No...that's purchasing.	
Our suggestion system asks for everybody's ideas, keeps them on their toes, keeps them thinking. Is that VA?	No.	
As a PA--if instead of accepting the best quotation I negotiate with the supplier for better prices, is that VA?	No.	
I'm a salesman. If I sell a std item instead of causing the factory to make something different, is that VA?	No.	
As a salesman--if I stop taking a customer to lunch, is that VA?	No.	
If I as a salesman rearrange my time & route so that I call on my customers with less traveling expense & traveling time--is that VA?	No.	
If as an engr. I use a new mat'l that makes just as good a product at lower cost, is that VE?	No.	
If I design out labor, is that VE?	No.	
If I keep all of the utility of the product but eliminate some of the gingerbread, is that VE?	No.	
If we are having field failures & I design in some more quality, is that VE?	No.	
As a process engr, if I find a process that reduces costs, still keeps quality, is that VA?	No.	
If I study the mfg line & find I can rearrange work stations & make the product on one floor instead of two with large savings, is that VA?	No.	
If I can improve work flow & reduce o'time, is that VA?	No.	

If by better plans with diff. job rotation or work scheduling, I can reduce idle time in the factory, is that VA? No.

If I benefit the co. by shipping scarce items first to the customers who need them most, then completing shipments to others, is that VA? No.

If as a mgr. I have two engrg. depts. & can combine into one reducing the payroll--still get the same good results--is that VA? No.

If as a mgr. I see men who are not doing their jobs well, hire teachers to teach them &, as a result, increase output substantially, is that VA? No.

I study & measure the similar work of two groups, then, by causing ea. to also use the better approaches of the other, I get 25% more results. Is that VA? No.

Do I understand that the words VA & VE have exactly the same meaning?

No. They cover precisely the same approaches & techniques--the same system. When parts of the system are used in the non-engrg. sphere, the system is called VA. When the system is used by men who are professionally qualified engrs. in the sphere of engrg. work, it is called VE.

Isn't this foolish or irregular to apply diff. names at diff. times to the same thing?

No. It is very common to call identical products or techniques by diff. names when they are differently used. For example, the same product to a farmer is a rope, to a ranchman a lariat, to a boatsman a line. The identical piece of fabric will, according to its use, be called a tie, a coat, a dress. It isn't my intention to debate the propriety of calling the same prod. by diff. names depending upon the way it is used, but rather to call attn to the fact that it is a normal established practice in our education system & way of life.

System - piano - jet

Psycho.

Environment - part/plane, training, airstrip

Decisions minimize pain to mgrs.

Define VA definition

Water Closet

People 75%

Applies to service

Function cost relationships

Full time vs. part time specialists

$M_I + M_E = \text{result}$

VA is way to increase  $M_I$