TRUCK MEASUREMENT JOB AID

TRUCK BED MEASUREMENTS AND VOLUME COMPUTATIONS

All debris paid for by the cubic yard in vehicles shall be hauled in approved, measured vehicles.

The measurements shall be taken and computed prior to the vehicle beginning hauling operations.

Truck measurement forms shall be used for documentation of the measurements.

The proper use of this form will expedite the processing of PW's by establishing specific methods of measurements, and specific methods of rounding off computations.

PROCEDURE FOR DOCUMENTING TRUCK MEASUREMENTS

Truck Measurement Forms shall be used for documentation.

1. Fill in all blanks as applicable. If not applicable, indicate by "N.A.". This applies to other information as well as dimension blanks. IMPORTANT: Form must be INITIALED and DATED at time of preparation, By FEMA, Applicant and Contractor.

Measure and record appropriate dimensions to the accuracy desired as noted on the form. Length measurements will be made as indicated on appropriate truck elevation.

When measuring the truck use the elevation (A or B) that conforms with the configuration of the trucks being measured. Indicate by a solid line, over the appropriate dashed line, the configuration of the truck.

Width measurements will be for metal portion of bed only. No additional width will be allowed for offset which may occur at point of build-up above metal bed.

2. Measure and record height at front and back as noted on form. Sides must be constructed to a straight line from front to back. (If bed height is not the same as front and back, the difference in height must be a uniform change). In measuring height avoid LOW or BENT places in bottom of bed. Both the front of bed and tailgate must be constructed to a height equal to or greater than that of the bed and/or build-up.

INSERT PICTURE HERE

3. Measure to the accuracy specified on the form. If the bed has a radius in front, the following procedure will be used in determining radius (see Figure 27).
   a. Extend tape measure across bed at the beginning of curve from point D to point C.
   b. Extend a ruler from point A to point B and B to C, record R1 and R2 and use average of the two. (Considering both corners to be symmetrical, you may measure either corner to find the average radius). Disregard all radii less than1.0'.

INSERT PICTURE HERE

   c. The volume to be subtracted for two radii can be obtained from Correction Table No. 1 (Figure 29).

4. Compute volume to nearest 0.01 cubic yard. As calculations are made, carry to one significant place greater than most accurate measurement and round off after each step. If the last digit is 5 or greater round up to the next higher.

   Example: In computation of major bed volume. Length RHS= 10.5;

   Length LHS= 10.4 $\dfrac{10.5+10.4}{2}$ =   10.45   L=10.45

   Width: Front Top= 7.3; Front Bottom=71.; Back Top=7.4 Back Bottom=7.1;
   $\dfrac{7.3+7.1+7.4+7.1}{4}$ =   7.22   W=7.2'

   Height: Front RHS=3.48'; Front LHS= 3.49'; Back RHS=3.51'
       Back LSH= 3.49' $\dfrac{3.48+3.49+3.51+3.49}{4}$ = 3.492'   H-3.49'

   Volume: 10.5 X 7.2 X 3.49
       10.5 X 7.2= 75.600   75.6X 3.49= 263.844 use 263.84

Compute volume to the nearest 0.01 cubic foot on all additional volume and intrusions. Indicate volume in appropriate blanks to the nearest 0.01 cubic foot. Add or subtract as appropriate to obtain the net volume in cubic yards.

Compute cubic years to 0.001 and round to hundredths.

Example: Net volume in cubic feet- 263.84

$$\frac{263.84}{27} = 9.771 \text{ cu yd.}$$ Computed volume= 9.77 cu. Yd.
Pay Volume= 9.5 cubic yards

Net volume in cubic feet= 263.93

$$\frac{263.93}{27} = 9.775 \text{ Cu. Yd.}$$ Computed Volume= 9.78 Cu. Yd.
Pay Volume = 9.5 cubic yards