

## Example of Sigma Freight Application for Multiple Suppliers of the Same Input

<b>Producer 1</b>						
Input - Coal	Volume	Kilometers	Sigma Cap	% Weight	W/A Kilometers	
Coal Supplier 1	3,600	43	5	18%	0.88	
Coal Supplier 2	5,000	19	5	25%	1.23	
Coal Supplier 3	3,800	45	5	19%	0.93	
Coal Supplier 4	8,000	3	3	39%	1.18	
	20,400	110				1 4.22
TOTAL SUBJECT MERCHANDISE PRODUCTION = 97,634 Kilograms						
<b>Sigma Distance = 5 Kilometers</b>						

Suppliers 1, 2 & 3  
Have Distances Higher  
Than Sigma so Use  
**Sigma Distance**

<b>Apply Sigma To Each Producer &amp; W/A Using Volume of Coal Supplied to each Producer</b>				
Producer	Coal Supplied	Kilometers	% Weight	W/A Kilometers
1	20,400	4.22	48%	2.03
2	21,990	30.64	52%	15.89
	42,390			1 17.92

<b>Producer 2</b>						
Input - Coal	Volume	Kilometers	Sigma Cap	% Weight	W/A Kilometers	
Coal Supplier 1	2,000	90	45	9%	4.09	
Coal Supplier 2	12,000	24	24	55%	13.10	
Coal Supplier 3	4,000	48	45	18%	8.19	
Coal Supplier 4	3,990	29	29	18%	5.26	
	21,990	191				1 30.64
TOTAL SUBJECT MERCHANDISE PRODUCTION = 38,437 Kilograms						
<b>Sigma Distance = 45 Kilometers</b>						

Supplier 1 & 3  
Distances are Higher  
Than Sigma so Use  
**Sigma Distance**