
From: John Ryan <jfryan@comcast.net>
Sent: Friday, September 19, 2014 9:13 AM
To: 'mike thrapp'
Cc: Nanette Albanese
Subject: RE: Revaluation - discussion on updating
Attachments: Valuation Detail Example.pdf

Mike,

It was a pleasure meeting you this past Wednesday. I found the meeting productive and informative.

As we discussed, attached is a copy of a "Valuation Detail Sheet" which details the components of a property value estimate.

While not specifically categorized as to their source, unit values and percentage adjustments are derived either directly using inferential statistics or heuristically based on informed local appraisal knowledge. We didn't discuss this in detail but NCSS, the statistical software that provides the capability to generate values, has two procedures that allow one to "force" otherwise statistically insignificant variables into a valuation model. What this simply means is that a final value (land and total value) can simply be passed in a file. Alternatively, using a stored procedure in your database, the valuation model is replicated and values are generated directly in the database.

An example of what a simple valuation model looks like is as follows:

Factor Detail

Overall	$Date^{(B1)} * (B2)^{(Neighborhood=4)} * (B3)^{(Neighborhood=6)}$
Land	$LotAdjusted^{(B8)} * ((B9) * LotSize)$
Building Grade	$Linear^{(B4)} * ((B5) * SqFt1stFlr + (B6) * SqFtOthFlr + (B7) * Baths)$
Garage	$(B10) * GarageSqFt$

Valuation Model

$$Date^{(4.66215216533015E-02)} * (0.945168518786127)^{(Neighborhood=4)} * (1.00666919375535)^{(Neighborhood=6)} * ((LotAdjusted^{(3.0643663225902)} * ((0.499066748801895) * LotSize)) + (GradeLinear^{(1.77611087858318)} * ((2.22552851585402) * SqFt1stFlr + (1.63455938516463) * SqFtOthFlr + (5.39127079611148) * Baths)) + ((2.32523766293606) * GarageSqFt))$$

The valuation report as noted simply drops the model coefficients and transformation, if any, of the original unit values (total living area is adjusted .990 in this example). The goal of course is to place the most value on the factors that the market indicate are significant and to minimize the value placed on factors referred to in our meeting as "PR" factors. In conclusion, the goal of a Valuation Detail Sheet is to provide the Assessor and ultimately the public with an easy to understand description of their property value. While some may not like the individual component values, this sheet provides the components that gets one to their the total value which at the end of the day is the only estimate subject to appeal.

I'll be happy to answer any questions going forward.

Have a good weekend.
John