WEB FEATURE

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the truth about *relifing* assets

Many not-for-profit hospitals still using the lives developed by the American Hospital Association to maximize depreciation for Medicare purposes that are no longer relevant can reduce expenses and increase income by updating useful life estimates.

AT A GLANCE

- Many not-for-profit hospitals have been over-depreciating their facilities for years based on a Medicare cost reimbursement program that is no longer in effect.
- Such over-depreciation adversely affects stated fixed asset values, equity/fund balances, and net income; it also increases the cost of borrowing.
- Reviewing the estimated useful life of an organization's fixed assets and extending the assets' lives where appropriate—a process known as relifing—can effectively remedy the situation.

Under generally accepted accounting principles (GAAP), estimates play a role in many aspects of financial reporting, one of them being the useful lives used to determine periodic depreciation expense of a facility or other equipment. The logical question is, over what time period do these useful lives extend? This is an important consideration because the larger the depreciation amount for a given period, the lower the operating income for that same period and vice versa.

For years, many finance executives of not-for-profit hospitals have been over-depreciating their facilities at the expense of their stated fixed asset values, equity/fund balances, and net income.[a] These executives can effectively remedy this situation by reviewing the estimated useful life of their organizations' fixed assets and extending the assets' lives where

a. Holmes, J.R., and Felsenthal, D. "Depreciating and Stating the Value of Hospital Buildings: What You Need to Know," *hfm*, October 2009.

appropriate—a process that has come to be known as *relifing.* However, many finance executives hesitate to undertake facility or component relifing despite its potential benefits, largely due to a lack of understanding.

In the case of hospitals, the building asset value depends on both structural components, which generally have a relatively long useful life, and the nonstructural component assets that also are necessary for the facility to function. Taken together they result in a composite useful life, the group life of component assets that compose a larger asset such as a building.

Today, when valuing hospitals, most appraisers use a 50-year composite life, which was recommended by the American Hospital Association (AHA) some 50 years ago.[b] It is also the life recommended by both leading publications of hospital life information— RSMeans and Marshall & Swift.

Why Shorter Useful Lives Were Adopted

With the advent of Medicare in the mid-1960s, hospitals began receiving actual cost reimbursement for their depreciation expense. These payments encouraged the healthcare industry to seek the shortest possible asset useful lives to receive payment as quickly as possible from Medicare. In 1969-70, the AHA surveyed a number of appraisal firms asking them what they believed the shortest, supportable composite building life could be. The response was a unanimous 40-year composite life for buildings, prompting the AHA to change its recommendation for a building composite life from 50 years to 40 years, which constituted a direct contradiction to the AHA's earlier recommendation. At that time, however, Medicare accepted the 40-year composite life for reimbursing depreciation expense.

Here, it is important to note that the AHA's new recommendation was based on estimates, and there is an important difference between *actual useful life*, which refers to the final productive life of the asset, and *estimated useful life*, which is simply an estimate of the asset's likely productive life.

Subsequent AHA publications went further, recommending a 20-year life for building services that included heating, ventilation, and air conditioning (HVAC); plumbing; and electrical systems. This information is necessary for capitalizing building assets on a component basis rather than a single composite life. However, the AHA's action had unintended results. What had started out as a way for AHA to reduce its published building composite life to enable more rapid depreciation payment produced, through the use of component depreciation rather than composite depreciation, an effective composite life of 23 to 26 years. This composite was the combination of a 40-year composite life assigned to the structural components of the building and a 20-year component life based on building services.[c]

A composite useful life is estimated based on the individual component asset lives multiplied by their dollar contribution to the whole. The total weighted cost of the components is then divided by the total project cost to arrive at the building (group) composite life. GAAP accepts a composite life for depreciating a group of component assets.

Hospital buildings generally comprise 20 to 25 component assets. For illustrative purpose, we will consider, below, a component list for a hospital that has 23 typical hospital building components, which—as depreciable, controllable components—should be part of the hospital's fixed asset record. It should be noted that that the first eight components in these lists are structural (i.e., site preparation, foundation, frame, exterior basement walls, exterior walls, floors structure, roof structure, and roof cover).

b. It should be noted that the AHA specifically states it is only the publisher of useful lives for hospital assets, not the source.

c. These composite lives correspond, generally speaking, to what the IRS now considers 1250 and 1245 property, respectively.

THE EFFECT OF ASSET LIVES ON ANNUAL DEPRECIATION EXPENSE CALCULATIONS

Description	Construction Costs	AHA Useful Life	1st Year Depreciation	Study Useful Life	1st Year Depreciation	40-Year Composite	1st Year Depreciation
Direct Costs							
Site Preparation	3,008,549	40	75,214	75	40,114	40	75,214
Foundation	7,458,587	40	186,465	75	99,448	40	186,465
Frame	35,541,829	40	888,546	75	473,891	40	888,546
Exterior Basement Walls	937,158	40	23,429	75	12,495	40	23,429
Exterior Walls	19,414,443	40	485,361	75	258,859	40	485,361
Floors Structure	17,029,278	40	425,732	75	227,057	40	425,732
Roof Structure	4,170,910	40	104,273	75	55,612	40	104,273
Roof Cover	1,134,830	10	113,483	10	113,483	40	28,371
Interior Partitioning and Built-ins							
Core/Shaft/Demising Partitions	74,164,988	20	3,708,249	50	1,483,300	40	1,854,125
Dividing/Movable/Removable Partitons and Built-ins	49,443,326	20	2,472,166	20	2,472,166	40	1,236,083
Ceiling Finish	5,905,296	8	738,162	10	590,530	40	147,632
Floor Covering	9,172,888	10	917,289	10	917,289	40	229,322
Plumbing System							
Distribution System	21,910,979	20	1,095,549	50	438,220	40	547,774
Connections	14,607,318	20	730,366	20	730,366	40	365,183
HVAC System							
Distribution System	14,835,740	20	741,787	50	296,715	40	370,893
Connections	22,253,608	20	1,112,680	20	1,112,680	40	556,340
Electrical System							
Distribution System	32,268,760	20	1,613,438	50	645,375	40	806,719
Connections	21,512,506	20	1,075,625	20	1,075,625	40	537,813
Other Features							
Sprinkler System	4,792,236	20	239,612	40	119,806	40	119,806
Elevators, Escalators, Dumbwaiters	3,977,495	20	198,875	45	88,389	40	99,437
Canopies, Links, Walkways, Roof Structures	1,407,360	20	70,368	40	35,184	40	35,184
Emergency Generators	3,739,555	20	186,978	25	149,582	40	93,489
Miscellaneous Other	1,508,440	15	100,563	15	100,563	40	37,711
Total Building Improvements Direct Costs	**370,196,080**		**17,304,209**		**11,536,749**		**9,254,902**

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Looking at the Effect of Real Numbers

The list is presented in two exhibits designed to illustrate the effects of building component assets and the application of different useful lives on depreciation and composite life of a newly constructed $370 million hospital building. The exhibit on page 3 shows the annual depreciation impact of calculating the depreciation expense for building component assets using three different sets of asset lives: AHA recommended lives, a straight 40-year composite life on all component assets, and the lives determined by a private appraisal company in an ongoing, unpublished national study, which was initiated in the early 2000s. For the proprietary study, the researchers looked at building component lives after discovering all of the not-for-profit hospitals participating in the study were still using AHA lives and fixed- asset accounting techniques, heedless of the fact that the techniques' design—which was to maximize depreciation—was obsolete because Medicare no longer pays for depreciation.[d] Note that the annual depreciation using AHA lives often is half again as much as that of the study's useful lives, which is arguably more realistic.

The exhibit on page 5 illustrates the effect of building-component lives, especially the lives of the structural components, on building computed composite life. It includes different composite lives calculated using AHA lives and the lives from the study. A third set of lives was added to illustrate the structural component lives required to obtain a 50-year composite life. Note that the weighted total for the study lives is nearly double that of the weighted total using the AHA lives—a clear indication that the lives assigned to the structural components have a major impact on the composite life.

The Impact on Financial Reporting

After a 10-year phase-out, Medicare eliminated depreciation payment entirely in 2001. Therefore, healthcare organizations that are still using the AHA useful lives should ask themselves whether the way they are amortizing their assets adequately reflects industry standards and provides an appropriate depreciation expense in the income statement. Clearly, using AHA recommended useful lives rather than using the more current, fact-based data produces an adverse effect on net income, fixed asset stated values, and fund/balances.

The study found that most healthcare organizations actually are using their assets longer than the AHA lives suggest. The useful lives reported in the study are reflective of current use by the providers, as well as the industry, and are more appropriate than are AHA lives for determining periodic depreciation expense. Updating a useful life estimate to reflect longer utilization results in both an immediate and long-term positive financial result.

Understating property, plant, and equipment (PP&E) understates equity/fund balance accounts. A reader of the financial statements will see a rapidly aging plant investment using AHA lives. After just 20 years of depreciation, using AHA lives, a typical hospital building will be 88 percent depreciated. Yet with normal use and maintenance, such a property can easily last from 80 to 100 years. It is difficult to envision a situation that would economically support this kind of obsolescence in 20 years. The impact of this rapid amortization also will be reflected in a number of financial ratios, including age of plant, debt to equity, and annual capital investment.

In a bond offering, the affected financial ratios could be construed by a credit rating analyst as a deferred maintenance issue that potentially would require additional capital to cure an under-investment in the PP&E account to maintain a competitive facility. This effect is in addition to the effect of lower income on the cost of borrowing. If existing assets are used to support a new bond issue, many of these assets may not be taken into account because they prematurely have been fully depreciated.

d. Initially, the study encompassed more than 400 hospitals throughout the United States. Hundreds of hospitals have been added to the database since the initial study.

THE EFFECT OF BUILDING COMPONENT LIVES ON BUILDING COMPUTED COMPOSITE LIFE

Description	Construction Costs	AHA Useful Life	Weighted Dollars	Study Useful Life	Weighted Dollars	Required Life	Weighted Dollars
Direct Costs							
Site Preparation	3,008,549	40	120,341,947	75	225,641,150	95	285,812,124
Foundation	7,458,587	40	298,343,480	75	559,394,025	95	708,565,765
Frame	35,541,829	40	1,421,673,173	75	2,665,637,200	95	3,376,473,786
Exterior Basement Walls	937,158	40	37,486,319	75	70,286,849	95	89,030,009
Exterior Walls	19,414,443	40	776,577,700	75	1,456,083,188	95	1,844,372,038
Floors Structure	17,029,278	40	681,171,126	75	1,277,195,862	95	1,617,781,425
Roof Structure	4,170,910	40	166,836,417	75	312,818,283	95	396,236,491
Roof Cover	1,134,830	10	11,348,299	10	11,348,299	10	11,348,299
Interior Partitioning and Built-ins							
Core/Shaft/Demising Partitions	74,164,988	20	1,483,299,764	50	3,708,249,409	50	3,708,249,409
Dividing/Movable/Removable Partitons and Built-ins	49,443,326	20	988,866,518	20	988,866,518	20	988,866,518
Ceiling Finish	5,905,296	8	47,242,369	8	47,242,369	8	47,242,369
Floor Covering	9,172,888	10	91,728,878	10	91,728,878	10	91,728,878
Plumbing System							
Distribution System	21,910,979	20	438,219,576	50	1,095,548,940	50	1,095,548,940
Connections	14,607,318	20	292,146,366	20	292,146,366	20	292,146,366
HVAC System							
Distribution System	14,835,740	20	296,714,794	50	741,786,985	50	741,786,985
Connections	22,253,608	20	445,072,165	20	445,072,165	20	445,072,165
Electrical System							
Distribution System	32,268,760	20	645,375,208	50	1,613,438,020	50	1,613,438,020
Connections	21,512,506	20	430,250,130	20	430,250,130	20	430,250,130
Other Features							
Sprinkler System	4,792,236	20	95,844,723	40	191,689,446	40	191,689,446
Elevators, Escalators, Dumbwaiters	3,977,495	20	79,549,906	45	178,987,289	45	178,987,289
Canopies, Links, Walkways, Roof Structures	1,407,360	20	28,147,200	40	56,294,399	40	56,294,399
Emergency Generators	3,739,555	20	74,791,098	25	93,488,873	25	93,488,873
Miscellaneous Other	1,508,440	15	22,626,597	15	22,626,597	15	22,626,597
Total Building Improvements Direct Costs	**370,196,080**		**8,973,653,754**		**16,575,821,239**		**18,327,036,321**
	Composite Lives		**24**		**45**		**50**

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Regardless of why the facility is being valued, a financial analyst will not only impute, at least subjectively, a potential future need for additional capital for PP&E, but also will penalize net income because of deferred maintenance. These findings will reduce the overall value of the facility.

Also, the rapid write-off of buildings results in a disconnect between long-term bonds, with maturities of 30 years or more, compared with the assets supporting them that are effectively being amortized in 23 to 25 years. The impact is to increase the debt-to-equity ratio.

All of the forgoing unfavorably affect financial results by reducing net income, net PP&E, and fund balance, which in turn has a negative effect on the financial ratios that are integral to the cost of borrowing. A small increase in the interest rate of 25 basis points can lead to a $100,000 annual increase in the borrowing cost of a $40 million loan.

These points are illustrated in the exhibit at left using numbers from the prior example. After 20 years of using AHA lives, the net book value is $138 million less than it would be if the study lives had been used. This balance sheet difference carries over to the income statement by negatively affecting both the operating income and equity by $138 million. Analysts note this difference when they look at the debt-to-equity ratios of 0.38, using AHA lives, or 0.29 using the study lives. Because the choice of useful lives produces such different results and have such a different impact on operating results, the analysts will not ignore the differences in the two balance sheets.

KEY FIGURES FROM THE EXAMPLE OF THE NEWLY CONSTRUCTED HOSPITAL*

Depreciation After 20 Years			
	Original Cost	Accumulated Depreciation	Net Book Value
AHA Lives	370,196,080	326,415,703	43,780,377
Study Lives	370,196,080	188,296,083	181,899,997

Net Income Impact	138,119,620

Debt After 20 Years		
30-Year Bond	20-Year Pay Down	Outstanding Debt
320,000,000	158,000,000	162,000,000

Beginning Debt	320,000,000
Beginning Equity	750,000,000

Equity After 20 Years	
AHA Lives	423,584,297
Study Lives	561,703,917

Debt-to-Equity Ratio's After 20 Years	
AHA Lives	0.38
Study Lives	0.29

* Based on values from tables showing comparative effects of useful lives and building component lives.

This example assumes a beginning equity of $750 million to illustrate how over-depreciating assets results in an inflated debt-to-equity ratio.

The Truth About Relifing

Many hospitals and health systems have performed relifing studies of their buildings, and more recently, their movable equipment, over the past few years. But getting organization leadership to recognize the value of relifing can sometimes be more difficult than performing the relifing itself. The projected results of new approach can be so large and positive, due to the history of over-depreciating, that they could raise skepticism among some finance leaders and governing bodies, making those parties hesitant about implementing an asset relifing.

To expand on the definition provided at the beginning of this article, *relifing* involves a change in an asset's estimated years of use (i.e., useful life) based on the actual historical lives of the assets being evaluated compared with similar ones in the industry. In and of itself, relifing does

not improve an organization's operating processes, nor does it increase an organization's cash reserves. It does play a significant role in determining income, however. The aversion to performing a relifing, even in the face of substantive and supportable facts, appears to be due to the size of the adjustment and the potential attention it draws from governing bodies and readers of the financial statements. Nonetheless, the change is a valid one that has become recognized and accepted by those invested in and reviewing the industry.

In this regard, several other truths about relifing also should be noted:

> External auditors accept relifing. It will not trigger the issuance of an unqualified opinion, but does require disclosure in the footnotes.
> Rating agencies will not objectively factor relifing into their qualitative analysis to assign a credit rating, because relifing does not improve operating earnings before interest, taxes, depreciation, and amortization (EBITDA), but it does have a strong subjective impact.
> Relifing has an annuity-like effect because the adjusted useful lives will maintain the ongoing reduced depreciation expense for the remaining life of the asset while it is owned. Meanwhile, using the new lives also will provide a lower depreciation for future construction projects.

Although many not-for-profit hospitals and health systems continue to use the AHA's recommended lives to depreciate their assets over a composite life of 23 to 26 years, as discussed previously, for-profits use a 39.5-year composite life for their hospital buildings. A number of years ago, the IRS adopted lives for hospital buildings that require a minimum 39.5-year composite life for 1250 property—i.e., property that pertains to the operation of the building as a building. In a new hospital, 1250 property constitutes 85 percent of the facility. The other 15 percent, which is required to serve the operation or function of the activity taking place within the building, is considered 1245 property and consists of components that can have different useful lives. As a result, for-profits today use longer useful lives than are used by most not-for-profit institutions. Not-for-profit hospitals that continue to use AHA lives therefore are at a disadvantage when compared with their for-profit competitors and those not-for-profit competitors that have undergone the relifing process.

Other Considerations

Hospital and health system finance executives that are contemplating undertaking a relifing should take the following additional preliminary steps:

> Check the organization's bond covenants to ensure that relifing does not affect them. Although it is unlikely a relifing will affect bond covenants, it is better to be safe than sorry.
> Notify the organization's rating agency so it is not surprised by resulting changes in operating performance. This step also can help the finance executive better understand how the relifing will factor into the agency's deliberations when it performs its next credit rating.
> Notify the organization's auditor, because some additional testing concerning the relifing details will be required and some assistance will needed in developing the footnote disclosure.
> Consider engaging a valuation company for any new building or major building refurbishing project under consideration before the project goes operational so that appropriate building components and their useful lives are assigned from the beginning and the full benefit is realized in the operating performance of the hospital.

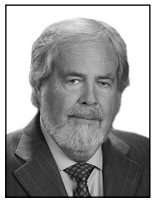
The result of a relifing on operational performance is to allow management some breathing room to make decisions on more substantive operating process decisions, from staffing to important project development.

Finance executives often view accounting for fixed assets as involving relatively static numbers, and they therefore direct their attention to fixed assets only during the budgeting process when developing the capital budget or when overseeing a major capital project development and the

resulting depreciation. Moreover, because financial decision makers generally are focused on outcomes, they often are unaware of relifing and the impact it can have on the operating income of an organization. Using asset useful lives that are not representative of the actual term of use could result in management developing a budget and future projections that negate the ability to meet strategic goals and objectives due to the reduced operating results that are provided by an overstated depreciation expense.

For this reason, alone, hospital leadership should understand and consider asset relifing and see how they can benefit from how it can result in more appropriate reporting of PP&E on the balance sheet and of operating results in the income statement, using supportable fact-based information. ■

About the author



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