Proposed FSP—Calculation of expected losses under FASB Interpretation No. 46, *Consolidation of Variable Interest Entities.*
(Comment Deadline: May 26, 2003)

Q— Can an entity that has no history of net losses and expects to continue to be profitable in the foreseeable future be a variable interest entity?

A—Yes, an entity that expects to be profitable can have expected losses. The term *expected losses*, as used in Interpretation 46, does not refer to the net loss an entity may report in its income statement prepared in accordance with generally accepted accounting principles.

The calculation of *expected losses* is described in paragraph 8 and illustrated in Appendix A of Interpretation 46. Paragraph 8 requires that the outcomes used to calculate expected losses include the expected unfavorable variability in the entity's net income or loss and expected unfavorable variability in the fair value of the entity's assets, if it is not included in the net income or loss.

The following example illustrates the calculation of *expected losses*:

1. On January 1, 2004, Company X is formed to purchase a building, 95 percent of which is financed by debt and 5 percent by equity. The lenders will have recourse only to the building in the event that Company X does not make the required debt payments.

2. On the same day, Company Y enters into a five-year market-rate lease for the building that includes a guarantee of a portion of the building's residual value. The present value of the minimum lease payments, including the residual value guarantee, is less that 90 percent of the fair value of the building.

3. There are no other interests in Company X.

4. The appropriate discount rate is assumed to be 5 percent.

5. In accordance with paragraph 8, the estimated annual outcomes used in the example include Company X's estimated net income or net loss and the estimated changes in the fair value of its assets not reflected in net income or

loss. The guarantee is a variable interest in the entity because it relates to more than half of the entity's assets. Therefore, losses absorbed by the residual value guarantee are losses of the entity and are included in the outcomes used to calculate losses. For simplicity, the estimated outcomes, which include both cash flows and changes in the fair value of Company X's assets, and related probabilities are assumed to be the same each year of the five-year lease, and at the end of the lease, the carrying value of the building is assumed to be its fair value.

Table 1 shows the January 1, 2004, calculation of the expected outcome at the inception of the variable interest created by the lease. The fair value of the expected outcome is assumed to be equal to the sum of the present values of probability-weighted estimated annual outcomes for the five-year lease term, excluding the effects of the residual value guarantee. Any variation in estimated outcomes, as compared to the expected outcome, represents a change to the value of the entity or variable interest from the calculation-date value.

Table 1
(Amounts in Thousands)

Estimated Annual Outcomes[1]	Probability	Expected Annual Outcome	Fair Value of Expected Five–Year Outcomes[2]
$(10,000)	5.0%	$ (500)	$ (2,165)
(5,000)	10.0	(500)	(2,165)
0	20.0	0	0
10,000	50.0	5,000	21,648
50,000	15.0	7,500	32,471
	100.0%	$11,500	$49,789

[1] Estimated outcomes include both estimated cash flows and changes in the fair value of Company X's assets.

[2] The fair value is assumed to be the sum of the present values of the expected outcomes for each year of the five-year period. Because of the simplifying assumption that the annual estimated outcomes and probabilities are the same for each year of the five-year period, the expected annual outcomes are treated as level annuities in the present value calculations to determine the fair value of the five-year expected outcomes.

Table 2 shows the calculation of *expected losses* as the negative variability from the fair value of the expected outcome. Note that the estimated annual outcomes of $0 and $10,000 contribute to expected losses although neither amount is negative. To the extent that an estimated outcome, although positive, is less than the expected outcome, the company will lose value in relation to its value based on the expected outcome. Table 2 illustrates the calculation of this *expected loss* as the fair value of the probability-weighted negative variations from the expected outcome. *Expected losses* include all such negative variations.

Table 2
(Amounts in Thousands)

Estimated Annual Outcomes	Present Value of Estimated Five-Year Outcomes[3]	Fair Value of Expected Five –Year Outcomes (from Table 1)	Positive (Negative) Variation from Expected Value	Probability	Expected Losses	Residual Returns
$(10,000)	$(43,294)	$49,789	$(93,083)	5.0%	$(4,654)	
(5,000)	(21,648)	49,789	(71,437)	10.0	(7,144)	
0	0	49,789	(49,789)	20.0	(9,958)	
10,000	43,294	49,789	(6,495)	50.0	(3,247)	
50,000	216,473	49,789	166,684	15.0		$25,003
				100.0%	$(25,003)	$ 25,003

Negative variations can occur without having a net loss reflected in any of the estimated outcomes. Consequently, a profitable entity will have *expected losses* which must be considered in evaluating the sufficiency of equity-at-risk under paragraph 9c of Interpretation 46.

The guidance in this FSP is effective immediately for variable interest entities to which the requirements of Interpretation 46 have already been applied. The guidance should be applied to other variable interest entities as a part of the adoption of Interpretation 46. If this guidance results in changes to previously

[3] Because of the simplifying assumption that the annual estimated outcomes are the same for each year of the five-year period, the estimated annual outcomes are treated as level annuities in the calculation of the present value of estimated five-year outcomes.

reported information, the cumulative effect shall be reported according to the requirements of APB Opinion No. 20, *Accounting Changes*, in the first period ending after the final FSP is posted to the FASB website.