



Comment and propose on Requirements for Calculations 2.0

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1. Rounding in the "EDINET system"

3.3.2 Accuracy and rounding

Calculation checking should be performed using interval arithmetic. It must be possible to specify the rounding method used at the report-level.

1. Rounding in the "EDINET system"

○ Japanese disclosure practices

- Values are generally truncated after the decimal point.(monetaryItemType)

【 Example 1】:

- Cash / instance fact value : 1

→ estimated actual report value : 1 ~ 1.9999999 Unit: Million of Yen

【 Example 2】:

- Cash ,notes receivable and Inventories / instance fact value : 1

→ estimated actual report value : 1 ~ 1.9999999

- **Total current assets** / instance fact value : 3 or 4 or 5

→ estimated actual report value : 3 to 5.999997($\cong 1.999999 \times 3$)

Total current assets (3 ~ 5.999997)

└ Cash (1 ~ 1.999999)

└ Notes receivable(1 ~ 1.999999)

└ Inventories(1 ~ 1.999999)

1. Rounding in the "EDINET system"

○ Difficulty of interval estimation

- Interval estimation can not simply calculate.
- Interval estimation is affected by report structure.(parent- child)
- Various report structures exist.

○ Comment

calculation checking is difficult to use interval arithmetic in Japan.

2. Handling of Nil values

3.3.4 Nil values in calculations

Nil values should be interpreted as being an unknown value. This means that a calculation involving a nil fact cannot be performed, and attempting such a calculation should result in an error.

2. Handling of Nil values

○ Handling of Nil

- Nil values are not treated as unknown value.
- Nil values are treated as zero.

(This means that a calculation involving a nil fact "can" be performed)

○ Use case for Nil

- A certain item has a value in the previous period.
- But the item does not exist in the current period.

Unit: Millions of Yen

Account	PriorYear	CurrentYear
Cash and cash equivalents	0	-(Nil)
Trade accounts and notes receivable	1	1
Inventories	2	2
Total current assets	3	3

2. Handling of Nil values

Unit: Millions of Yen

Account	PriorYear	CurrentYear
Cash and cash equivalents	0	-(Nil)
Trade accounts and notes receivable	1	1
Inventories	2	2
Total current assets	3	3

- Prior Year

Cash and cash equivalents + Trade accounts and notes receivable + Inventories = Total current assets = $0 + 1 + 2 = 3$ 【OK】

- Current Year

Cash and cash equivalents + Trade accounts and notes receivable + Inventories = Total current assets = 0 + 1 + 2 = 3 【OK】

2. Handling of Nil values

○ Difference between Nil and zero

Zero	Nil
Exist	Not exist
0~0.999999	0

※Unit: Millions of Yen

○ Propose

- Calculations involving nil values should not be errors.
- Nil values are calculated as zero.