

# Programmierung WS 18

## Hausaufgaben - Blatt 11

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Gruppe 12

### HA 2

(i)

$$\sigma_1 = \{Z = a\}$$

$$\sigma_2 = \{Y = g(X, a)\}$$

$$\sigma_3 = \{X = g(a, Y)\}$$

$$\sigma = \sigma_3 \circ \sigma_2 \circ \sigma_1 = \{Z = a, Y = g(X, a), X = g(a, Y)\}$$

(ii)

$$\sigma_1 = \{X = a\}$$

=> Clash Failure,  $MGU(b, a)$  existiert nicht.

(iii)

$$\sigma_1 = \{Z = h(Y)\}$$

$$\sigma_2 = \{X = a\}$$

$$\sigma_3 = \{Y = h(a)\}$$

=> Occure Failure

(iv)

$$\sigma_1 = \{W = h(X)\}$$

$$\sigma_2 = \{Y = a\}$$

$$\sigma_3 = \{Z = g(a, a)\}$$

$$\sigma_4 = \{X = b\}$$

$$\sigma = \sigma_4 \circ \sigma_3 \circ \sigma_2 \circ \sigma_1 = \{W = h(X), Y = a, Z = g(a, a), X = b\}$$

(v)

$$\sigma_1 = \{X = Y\}$$

$$\sigma_2 = \{Y = a\}$$

$$\sigma = \sigma_2 \circ \sigma_1 = \{X = Y, Y = a\}$$

### HA 4

### HA 6