| w_3 | w_2 | w_1 | w_0 | y_1 | y_0 | Z | |
|-------|-------|-------|-------|-------|-------|---|--|
| 0 | 0 | 0 | 0 | d | d | 0 | |
| | | | 1 | 0 | 0 | 1 | |
| | | | X | | 1 | | |
| 0 | 1 | X | X | 1 | 0 | 1 | |
| 1 | X | X | X | 1 | 1 | 1 | |
| | | | | • | | | |
| _ | | | | | | | |

Figure 4.20 Truth table for a 4-to-2 priority encoder.