

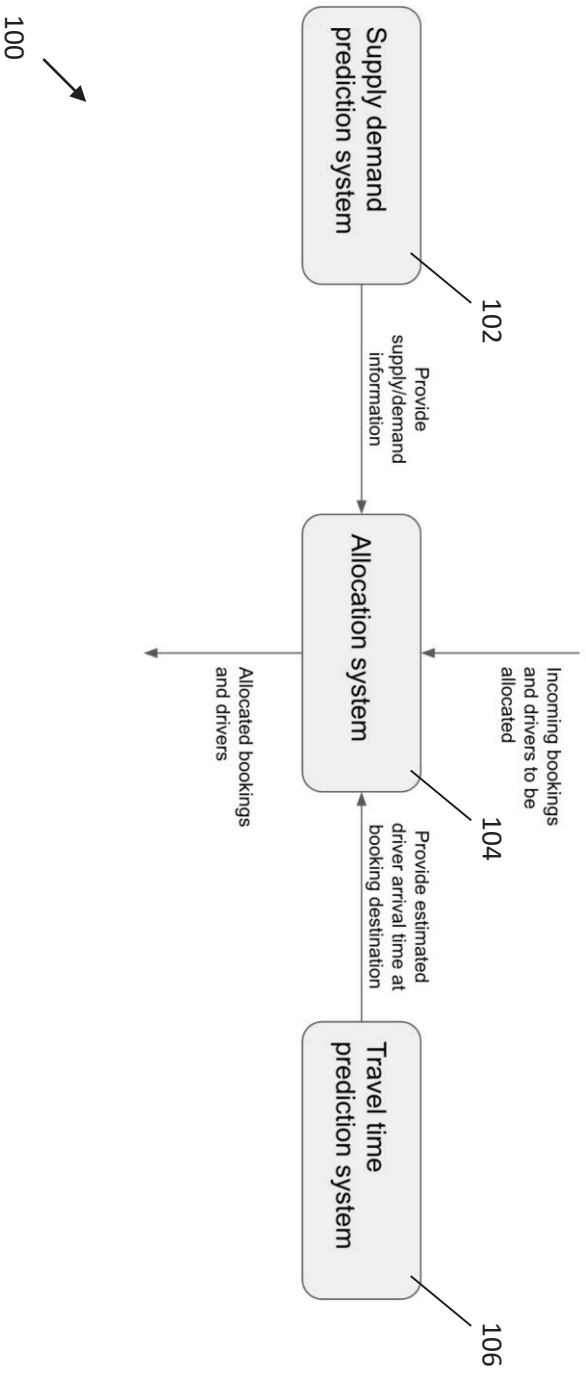


Figure 1

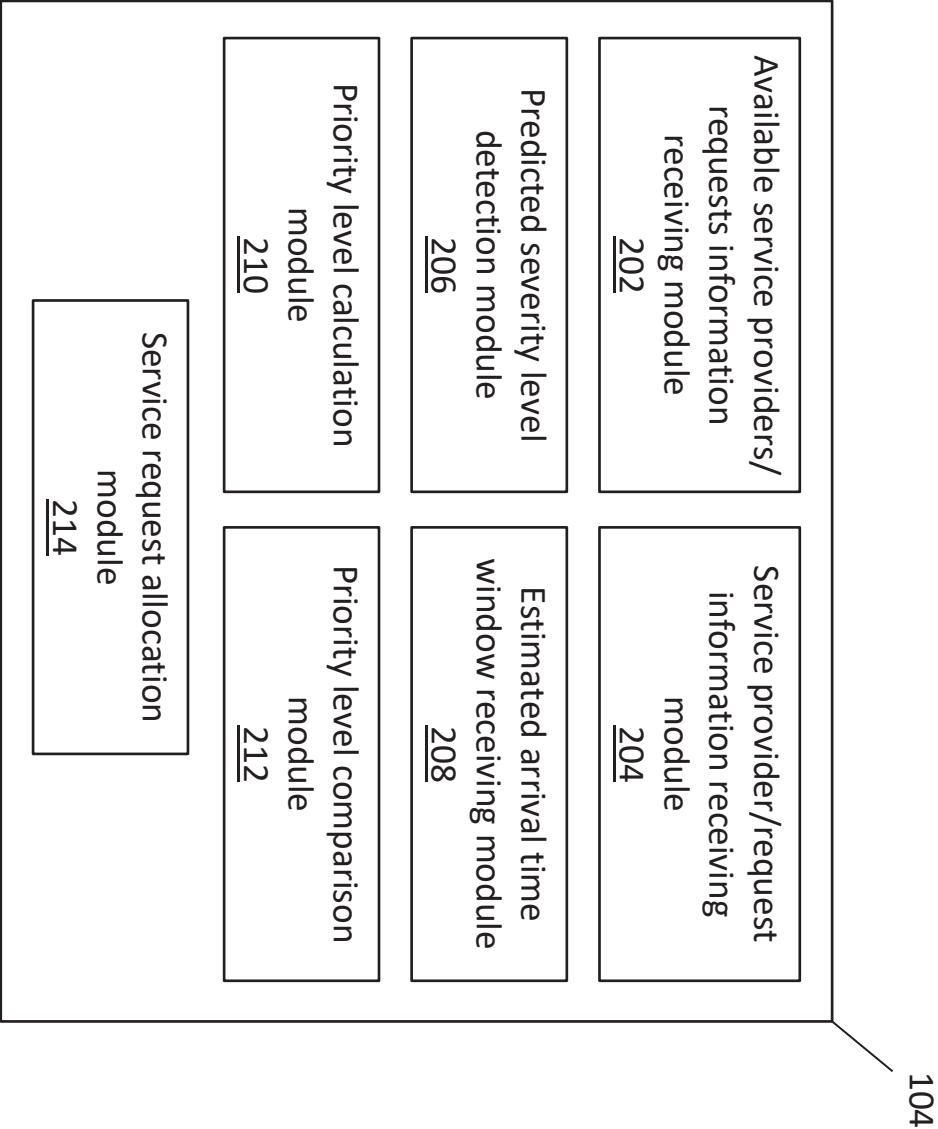
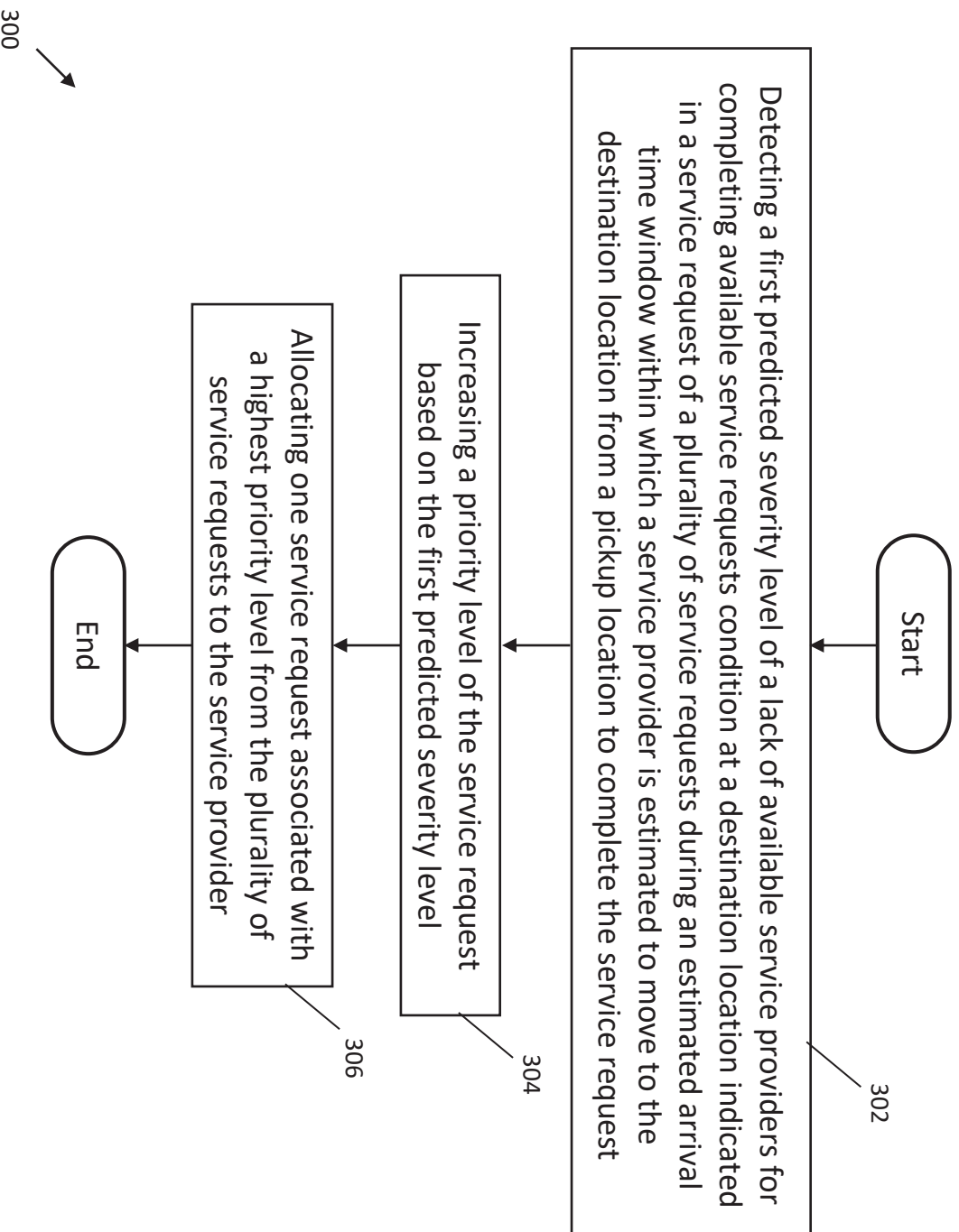
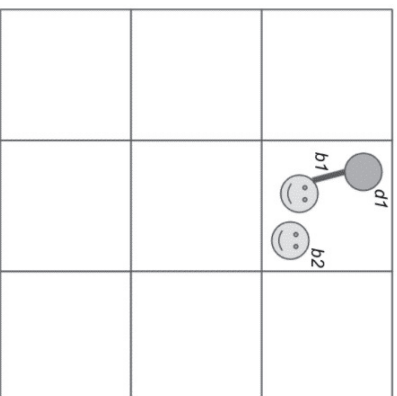


Figure 2

**Figure 3**

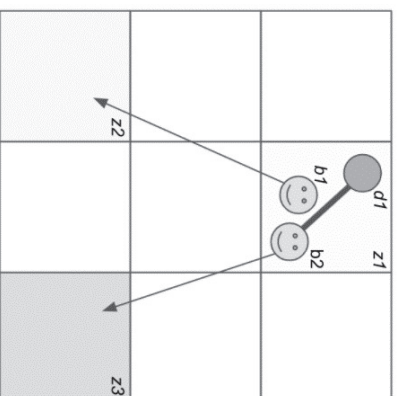
Previous allocation



Assignment cost

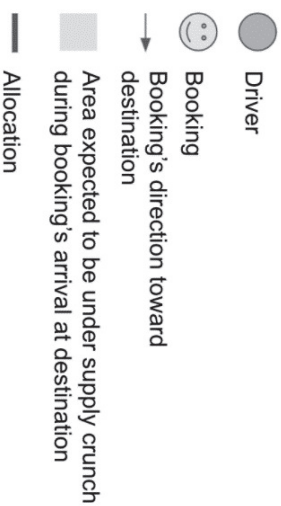
	$b1$	$b2$
$d1$	5	8

New allocation



Assignment cost

	$b1$	$b2$
$d1$	5 - 0 = 5	8 - 4 = 4



Supply crunch severity value at $z1$ currently:

$$s_{d1} = 1$$

Supply crunch severity value at $z2$ by the time driver $d1$ finishes booking $b1$: $s_{b1d1} = 2$

Supply crunch severity value at $z3$ by the time driver $d1$ finishes booking $b2$: $s_{b2d1} = 5$

Prioritisation value for $d1$ - $b1$ pair: $p_{b1d1} = s_{b1d1} - s_{d1} = 2 - 1 = 1$

Prioritisation value for $d1$ - $b2$ pair: $p_{b2d1} = s_{b2d1} - s_{d1} = 5 - 1 = 4$

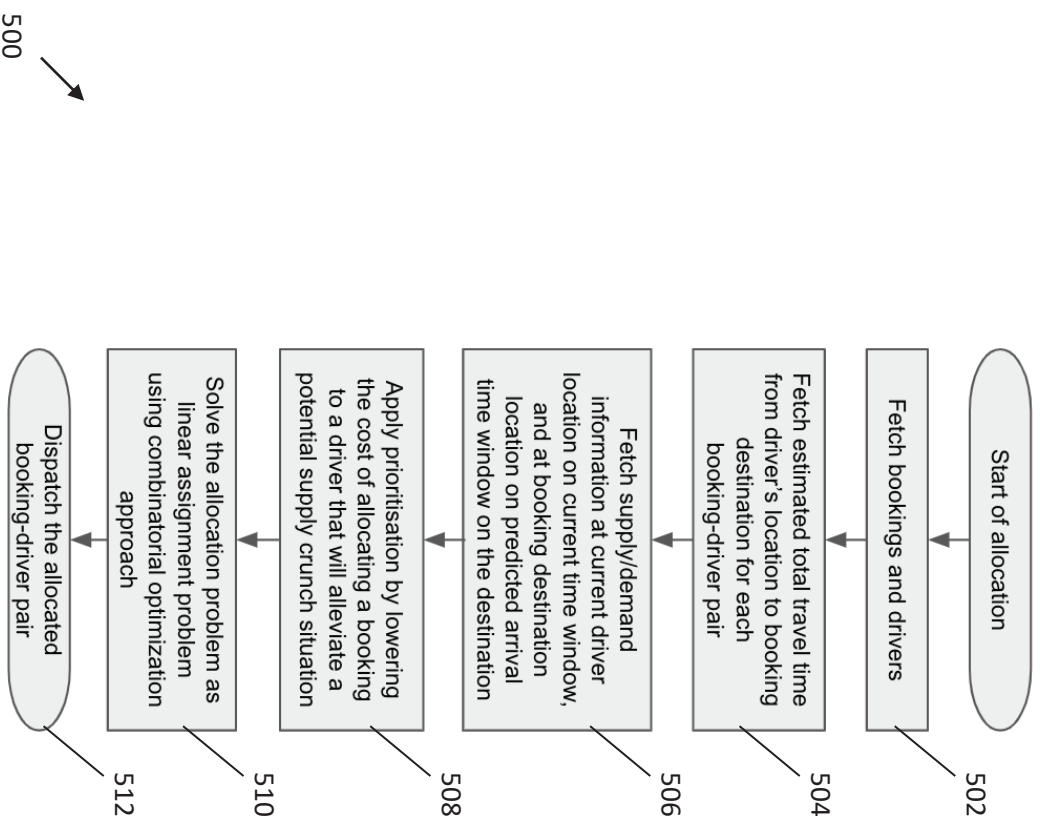
Assume that we set:

- Lower bound threshold: $lb = 2$
- Prioritisation multiplier: $pm = 1$

Since $p_{b1d1} < lb$, we do not apply prioritisation to booking driver pair $b1$ - $d1$.

Meanwhile, since $p_{b2d1} \geq lb$, we apply prioritisation to booking driver pair $b2$ - $d1$ as much as $p_{b2d1} \times pm = 4 \times 1 = 4$

Figure 4

**Figure 5**

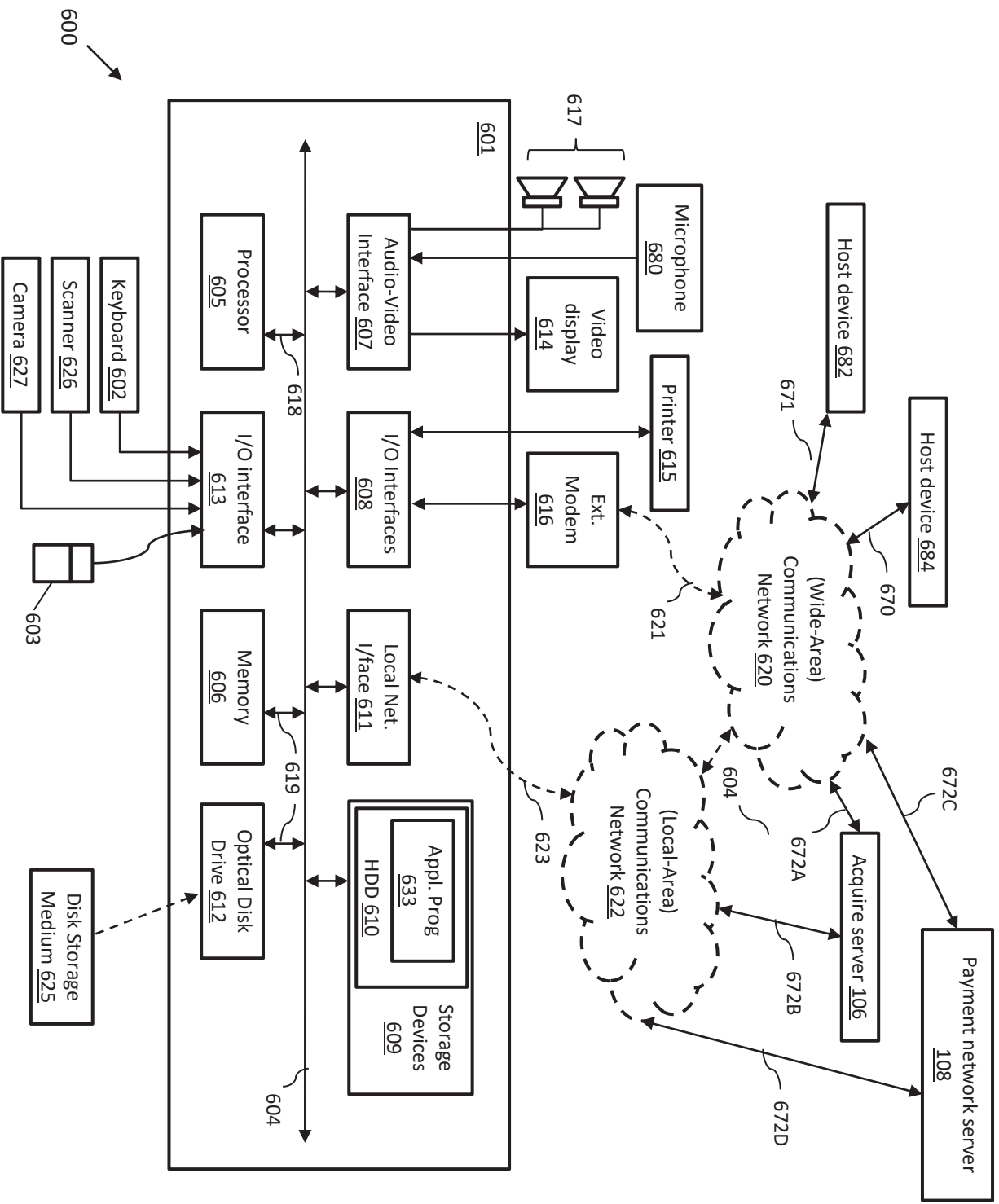


Figure 6

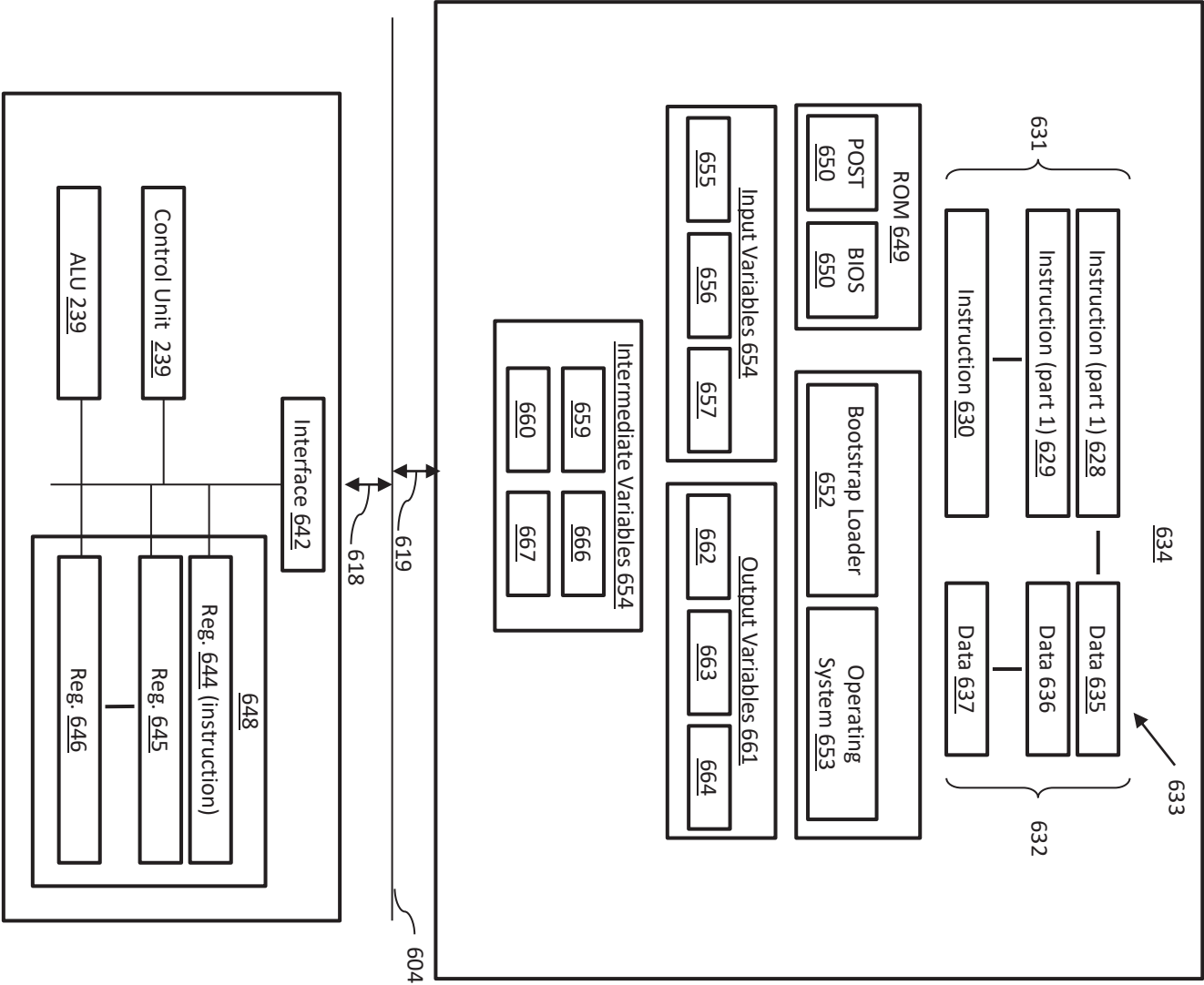


Figure 7