

```
.....  
a = a * b;  
c = a < b;  
if (c) then  
  a = b - x;  
else  
  a = b + x;  
  a = a + x;  
  b = b * x;  
.....
```

## Algorithmic Design

Mostly Manual

Micro-architecture Level  
(Synthesizable Subset)

**High Level  
Synthesis**

Register Transfer Level (RTL)

Golden  
Reference  
Model

Specification

Functionally  
Equivalent

Functionally  
Equivalent

