

## Type provider

OpenCL C  
sources

OpenCL C  
lexer and  
parser

OpenCL C AST (for  
functions'  
signatures only)

### Type builder

- C to F# type mapping
- C functions to methods converting (signatures only)

## User program

```
type Provided = KernelProvider<clSourcePath,...>  
let command2 =  
    <@ fun (r:_2D) (a:array<_>) (b:array<_>) (c:array<_>) ->  
        Provided.myGEMM2(size, size, size, a, b, c)  
    @>
```

### Type (class)

- Method for each kernel function from loaded file
- Private storage for all loaded C sources (to be passed to GPU)