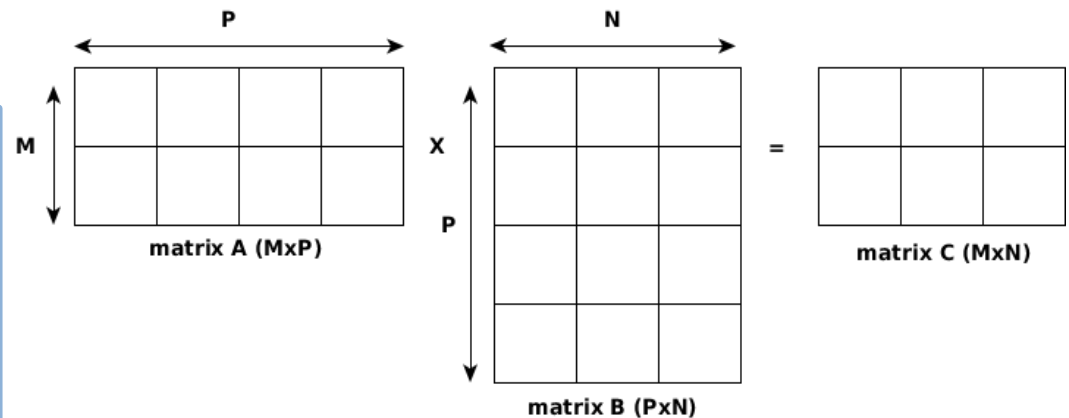


Class Work 3: matrix multiplication

- Implement a C++ program computing the standard ijk matrix multiplication algorithm between two matrices A and B of size $M \times P$ and $P \times N$, respectively.

```
for(size_t i=0; i<M; ++i)
  for(size_t j=0; j<N; ++j) {
    C[i*N + j] = 0;
    for(size_t k=0; k<P; ++k)
      C[i*N + j] += A[i * P + k]*B[k*N + j];
  }
```



- Parallelize the previous code using the FastFlow ParallelFor ParallelForReduce patterns. Implement 3 versions:
 - ParallelFor applied to the first (external) loop (index-i)
 - ParallelFor applied to the second loop (index-j)
 - ParallelForReduce applied to the innermost loop (index-k)