

Thrust-cuda-11.6

thrust

→ асинх

→ detail

→ iterator

 $\rightarrow mr$

→ random

→ system

→ type traits

→ API

container

algorithms

function heat

Memory management

Nummer C

Parallel Execution Policies

Random Number Generator

System

Utilities

copying

merging

Prefix Sums

Reduction

Reordering

Searching

Set operations

Sorting

Transformation

模板

拈(zi) (声母)

include detail

(乘积)

details

include detail

(宣坎)

AP I

$\text{copy}(\text{execution policy \& ...}) \Rightarrow \text{detail/copy} \Rightarrow \text{system/genetic/copy} \Rightarrow \text{system/genetic/detail}$
 $\boxed{\text{copy.h}} \quad \boxed{\text{copy.inl}} \quad \boxed{\text{copy.h}} \quad \boxed{\text{copy.inl}}$

template <Derived Policy>
+ thrust::detail::execution_policy_base <Derived Policy> } 升级 api 接口
thrust &

template <Perired Policy>
class thrust::execution_policy { }

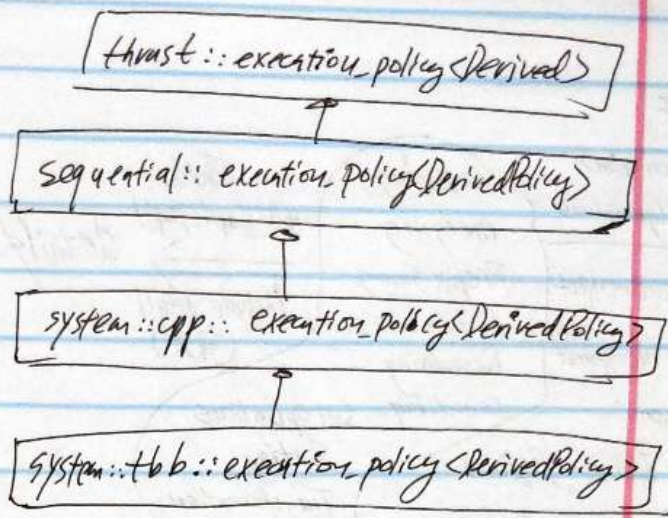
Derived Policy (CRTP)

父类包装类, 还可以直接传给文本的 const

transform with identity

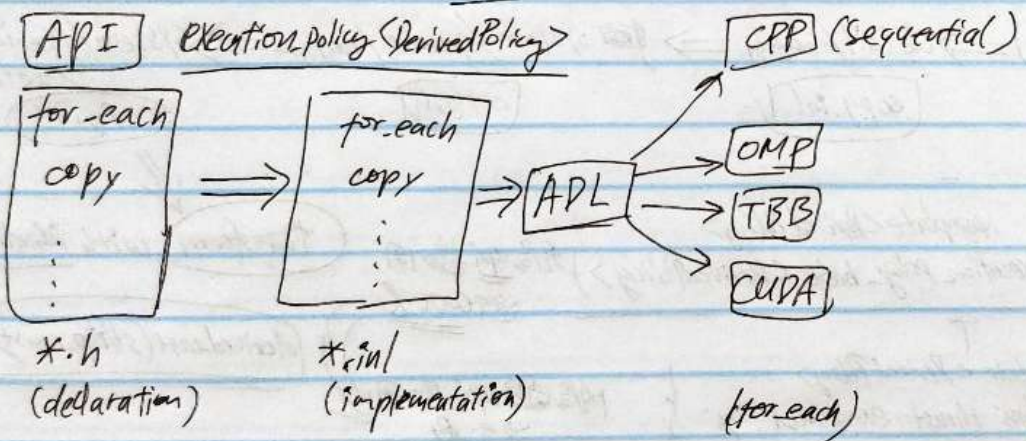
derived cast(strip_cast)

copy { sequential::execution_policy<DerivedPolicy> thrust::system::detail::sequential
 tbb::execution_policy<DerivedPolicy> ~~thrust::system::detail::tbb~~ tbb::detail



THRUST-HOST-SYSTEM { CPP : 基本不用 sequential 多线程 (多线程)
 OMP
 TBB.

THRUST-DEVICE SYSTEM { CUDA



using std::swap;
 swap(*, other.X);

ADL
 Argument Dependent Lookup

using thrust::system::detail::generic::XXX;
 for_each(thrust::detail::derived_cast(thrust::detail::strip_const(exec)...), ...)

返回 DerivedPolicy
 用附带的 policy.

⇒ 这里会找到第几个参数所在 namespace
 定义 for_each !! 而不是 generic::

没有 namespace