# 参考文档链接

v8 引擎更新日志[Blog · V8](https://v8.dev/blog)

v8 仓库 [v8/v8: The official mirror of the V8 Git repository (github.com)](https://github.com/v8/v8)

V8 编译环境搭建[GN 构建配置 (chromium.org)](https://www.chromium.org/developers/gn-build-configuration/" \l "android-build-from-linux)

V8 android 编译文档 [Chromium Docs - Checking out and building Chromium for Android (googlesource.com)](https://chromium.googlesource.com/chromium/src/+/HEAD/docs/android_build_instructions.md)

参考博客文档

[认识 V8 引擎（3）- 编译 V8 9.1 - CoderZh Blog](https://blog.coderzh.com/2021/06/14/v8-3/)

[cstsinghua/V8Android: A demo APP for embedding V8 engine in Android APP (github.com)](https://github.com/cstsinghua/V8Android)

# 环境

Android 编译目前只能在Linux系统下

# 编译主要流程

**获取 v8编译工具 depot\_tools**

git clone https://chromium.googlesource.com/chromium/tools/depot\_tools.git

**配置 工具环境变量**

export PATH="$PATH:/path/to/depot\_tools"

**获取 v8 仓库**

mkdir v8

cd v8

fetch v8

#这里不能自己去clone 仓库因为 fetch 才会产生编译v8的配置文件.gclient

# git clone https://github.com/v8/v8.git

.gclient 添加 target\_os = [ 'android' ] 配置

solutions = [

{

"name": "v8",

"url": "https://github.com/v8/v8.git",

"deps\_file": "DEPS",

"managed": False,

"custom\_deps": {},

},

]

target\_os = [ 'android' ]

切换需要打包的git 分之

使用命令同步工程需要的工具

gclient sync

下载编译安卓所需的工具

build/install-build-deps.sh --android

使用 gn 工具 生成ninja编译配置

gn gen out/x86\_64.release

这里是生成了默认配置我们需要打开 out/x86\_64.release/args.gn 文件修改配置成

# Set build arguments here. See `gn help buildargs`.

is\_debug = false

symbol\_level = 0

target\_os = "android"

target\_cpu = "x64"

v8\_target\_cpu = "x64"

# arm\_version=8

# v8\_use\_snapshot=false

v8\_enable\_i18n\_support = false

v8\_use\_external\_startup\_data = false

is\_component\_build = false

v8\_static\_library = true

# v8\_android\_log\_stdout = true

v8\_enable\_sandbox = false

v8\_monolithic = true

use\_custom\_libcxx = false

target\_cpu 参数对应android cpu架构

| getprop ro.product.cpu.abi output | target\_cpu value |
| --- | --- |
| arm64-v8a | arm64 |
| armeabi-v7a | arm |
| x86 | x86 |
| x86\_64 | x64 |

每次修改配置文件后需要重新运行 gn gen out/x86\_64.release

使用 ninja 编译静态库会生成在out/x86\_64.release/obj/libv8\_monolith.a

ninja -C out/x86.release v8\_monolith

头文件在 v8 仓库根目录的 include下