Московский Авиационный Институт

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Институт №8 “Компьютерные науки и прикладная математика”

Кафедра №806 “Вычислительная математика и программирование”

Курсовой проект по курсу

«Операционные системы»

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Постановка задачи

Вариант 37.

1. По конфигурационному файлу в формате yaml, json или ini принимает спроектированный DAG джобов и проверяет на корректность: отсутствие циклов, наличие только одной компоненты связанности, наличие стартовых и завершающих джоб. Структура описания джоб и их связей произвольная.
2. При завершении джобы с ошибкой, необходимо прервать выполнение всего DAG’а и всех запущенных джоб.
3. Ini\Mutex

Общий метод и алгоритм решения

Использованные системные вызовы:

pthread_create() - создание потока

pthread_mutex_lock()/pthread_mutex_unlock() - блокировка мьютекса/разблокировка мьютекса

pthread_cond_wait() - ожидание условной переменной

pthread_cond_signal() - сигнал условной переменной

fork() - создание процесса

execl() - запуск программы

waitpid() - ожидание завершения процесса

malloc() - выделение памяти

fopen() - открытие файла

fgets() - чтение файла

fclose() - закрытие файла

printf() - вывод в stdout

fprintf(stderr, ...) - вывод в stderr

sysconf() - получение системной информации

return из main() - завершение программы

Алгоритм работы:

1. Запускается программа, создается структура DAG, парсится конфигурационный файл, строится граф зависимостей

2. Проверка на циклы, проверка связности, проверка стартовых и завершающих джобов

3. Инициализация очереди, создание пула рабочих потоков

4. Каждый рабочий поток выполняет цикл, выполнение команды джоба, Обработка результата

5. Проверяются все джобы, которые зависят от выполненного джоба, проверка завершения

6. При ошибке любого джоба устанавливается флаг has_failure = true, прекращение выполнения

7. Ожидание завершения потоков, вывод статистики, очистка ресурсов, завершение программы

Код программы

dag_scheduler.h

```
// dag_scheduler.h
#ifndef DAG_SCHEDULER_H
#define DAG_SCHEDULER_H



#include <stdio.h>
#include <stdlib.h>
#include <string.h>
#include <pthread.h>
#include <unistd.h>
#include <sys/wait.h>
#include <stdbool.h>
#include <ctype.h>
#include <errno.h>
```

```c
#define MAX_JOBS 100
#define MAX_NAME_LEN 50
#define MAX_CMD_LEN 512
#define MAX_DEPS 10


typedef enum {
    JOB_PENDING,
    JOB_READY,
    JOB_RUNNING,
    JOB_SUCCESS,
    JOB_FAILED
} JobStatus;


typedef struct Job {
    char name[MAX_NAME_LEN];
    char command[MAX_CMD_LEN];

    struct Job* dependencies[MAX_DEPS];
    int dep_count;

    struct Job* dependents[MAX_DEPS];
    int dep_on_count;

    JobStatus status;
    int exit_code;
    pthread_t thread_id;
} Job;


typedef struct {
    Job* jobs[MAX_JOBS];
```

```
    int job_count;

    pthread_mutex_t mutex;
    bool has_failure;
    bool stop_requested;
    bool all_jobs_completed;  // Добавляем этот флаг

    pthread_mutex_t queue_mutex;
    pthread_cond_t queue_cond;
    Job* ready_queue[MAX_JOBS];
    int queue_size;
    int queue_front;
    int queue_rear;
} DAG;


DAG* dag_create();
void dag_destroy(DAG* dag);
Job* dag_add_job(DAG* dag, const char* name, const char* command);
bool dag_add_dependency(DAG* dag, const char* from, const char* to);
bool dag_validate(DAG* dag);
void dag_execute(DAG* dag);
void dag_stop(DAG* dag);
bool parse_ini(const char* filename, DAG* dag);
void trim_string(char* str);
Job** get_start_jobs(DAG* dag, int* count);
Job** get_end_jobs(DAG* dag, int* count);


#endif
```

dag_scheduler.c

```
#include "dag_scheduler.h"
```

```
DAG* dag_create() {
    DAG* dag = (DAG*)malloc(sizeof(DAG));
    if (!dag) return NULL;

    dag->job_count = 0;
    dag->has_failure = false;
    dag->stop_requested = false;
    dag->all_jobs_completed = false;
    dag->queue_size = 0;
    dag->queue_front = 0;
    dag->queue_rear = 0;

    pthread_mutex_init(&dag->mutex, NULL);
    pthread_mutex_init(&dag->queue_mutex, NULL);
    pthread_cond_init(&dag->queue_cond, NULL);

    return dag;
}


void dag_destroy(DAG* dag) {
    if (!dag) return;

    for (int i = 0; i < dag->job_count; i++) {
        free(dag->jobs[i]);
    }

    pthread_mutex_destroy(&dag->mutex);
    pthread_mutex_destroy(&dag->queue_mutex);
    pthread_cond_destroy(&dag->queue_cond);
```

```
    free(dag);
}

Job* dag_add_job(DAG* dag, const char* name, const char* command) {
    if (!dag || dag->job_count >= MAX_JOBS) return NULL;

    Job* job = (Job*)malloc(sizeof(Job));
    if (!job) return NULL;

    strncpy(job->name, name, MAX_NAME_LEN - 1);
    strncpy(job->command, command, MAX_CMD_LEN - 1);
    job->name[MAX_NAME_LEN - 1] = '\0';
    job->command[MAX_CMD_LEN - 1] = '\0';

    job->dep_count = 0;
    job->dep_on_count = 0;
    job->status = JOB_PENDING;
    job->exit_code = 0;
    job->thread_id = 0;

    dag->jobs[dag->job_count++] = job;
    return job;
}

Job* find_job(DAG* dag, const char* name) {
    for (int i = 0; i < dag->job_count; i++) {
        if (strcmp(dag->jobs[i]->name, name) == 0) {
            return dag->jobs[i];
        }
```

```
    }
    return NULL;
}

bool dag_add_dependency(DAG* dag, const char* from, const char* to) {
    Job* job_from = find_job(dag, from);
    Job* job_to = find_job(dag, to);

    if (!job_from || !job_to) {
        fprintf(stderr, "Ошибка: Джоб '%s' или '%s' не найден\n", from, to);
        return false;
    }

    if (job_to->dep_count >= MAX_DEPS || job_from->dep_on_count >= MAX_DEPS) {
        fprintf(stderr, "Ошибка: Слишком много зависимостей для джоба\n");
        return false;
    }

    job_to->dependencies[job_to->dep_count++] = job_from;
    job_from->dependents[job_from->dep_on_count++] = job_to;

    return true;
}

static int get_job_index(DAG* dag, Job* job) {
    if (!dag || !job) return -1;

    for (int i = 0; i < dag->job_count; i++) {
        if (dag->jobs[i] == job) {
            return i;
```

```
        }
    }
    return -1;
}

static bool has_cycle_dfs(DAG* dag, Job* job, bool* visited, bool* rec_stack) {
    int index = get_job_index(dag, job);
    if (index == -1) return false;

    if (rec_stack[index]) return true;
    if (visited[index]) return false;

    visited[index] = true;
    rec_stack[index] = true;

    for (int i = 0; i < job->dep_on_count; i++) {
        if (has_cycle_dfs(dag, job->dependents[i], visited, rec_stack)) {
            return true;
        }
    }

    rec_stack[index] = false;
    return false;
}

static void dfs_connectivity(DAG* dag, Job* job, bool* visited) {
    int index = get_job_index(dag, job);
    if (index == -1 || visited[index]) return;

    visited[index] = true;
```

```
    for (int i = 0; i < job->dep_count; i++) {
        dfs_connectivity(dag, job->dependencies[i], visited);
    }

    for (int i = 0; i < job->dep_on_count; i++) {
        dfs_connectivity(dag, job->dependents[i], visited);
    }
}


bool dag_validate(DAG* dag) {
    pthread_mutex_lock(&dag->mutex);

    if (dag->job_count == 0) {
        printf("DAG пуст\n");
        pthread_mutex_unlock(&dag->mutex);
        return true;
    }

    bool* visited = (bool*)calloc(dag->job_count, sizeof(bool));
    bool* rec_stack = (bool*)calloc(dag->job_count, sizeof(bool));
    bool has_cycle = false;

    for (int i = 0; i < dag->job_count; i++) {
        memset(visited, 0, dag->job_count * sizeof(bool));
        memset(rec_stack, 0, dag->job_count * sizeof(bool));
        if (has_cycle_dfs(dag, dag->jobs[i], visited, rec_stack)) {
            has_cycle = true;
            break;
        }
    }
```

```
    free(visited);
    free(rec_stack);

    if (has_cycle) {
        fprintf(stderr, "Обнаружен цикл в DAG!\n");
        pthread_mutex_unlock(&dag->mutex);
        return false;
    }

    visited = (bool*)calloc(dag->job_count, sizeof(bool));
    dfs_connectivity(dag, dag->jobs[0], visited);

    int visited_count = 0;
    for (int i = 0; i < dag->job_count; i++) {
        if (visited[i]) visited_count++;
    }

    free(visited);

    if (visited_count != dag->job_count) {
        fprintf(stderr, "DAG имеет более одной компоненты связности!\n");
        pthread_mutex_unlock(&dag->mutex);
        return false;
    }

    int start_count, end_count;
    Job** start_jobs = get_start_jobs(dag, &start_count);
    Job** end_jobs = get_end_jobs(dag, &end_count);

    if (start_count == 0) {
        fprintf(stderr, "Нет стартовых джобов!\n");
```

```
        free(start_jobs);
        free(end_jobs);
        pthread_mutex_unlock(&dag->mutex);
        return false;
    }

    if (end_count == 0) {
        fprintf(stderr, "Нет завершающих джобов!\n");
        free(start_jobs);
        free(end_jobs);
        pthread_mutex_unlock(&dag->mutex);
        return false;
    }

    printf("DAG корректен. Стартовых джобов: %d, Завершающих: %d\n",
           start_count, end_count);

    free(start_jobs);
    free(end_jobs);
    pthread_mutex_unlock(&dag->mutex);
    return true;
}


Job** get_start_jobs(DAG* dag, int* count) {
    Job** start_jobs = (Job**)malloc(dag->job_count * sizeof(Job*));
    *count = 0;

    for (int i = 0; i < dag->job_count; i++) {
        if (dag->jobs[i]->dep_count == 0) {
            start_jobs[(*count)++] = dag->jobs[i];
        }
```

```
    }

    return start_jobs;
}

Job** get_end_jobs(DAG* dag, int* count) {
    Job** end_jobs = (Job**)malloc(dag->job_count * sizeof(Job*));
    *count = 0;

    for (int i = 0; i < dag->job_count; i++) {
        if (dag->jobs[i]->dep_on_count == 0) {
            end_jobs[(*count)++] = dag->jobs[i];
        }
    }

    return end_jobs;
}

static void enqueue_job(DAG* dag, Job* job) {
    pthread_mutex_lock(&dag->queue_mutex);

    if (dag->queue_size < MAX_JOBS) {
        dag->ready_queue[dag->queue_rear] = job;
        dag->queue_rear = (dag->queue_rear + 1) % MAX_JOBS;
        dag->queue_size++;
    }

    pthread_mutex_unlock(&dag->queue_mutex);
    pthread_cond_signal(&dag->queue_cond);
}
```

```
static Job* dequeue_job(DAG* dag) {
    pthread_mutex_lock(&dag->queue_mutex);

    while (dag->queue_size == 0 &&
           !dag->stop_requested &&
           !dag->all_jobs_completed) {
        pthread_cond_wait(&dag->queue_cond, &dag->queue_mutex);
    }

    if (dag->stop_requested ||
        (dag->queue_size == 0 && dag->all_jobs_completed)) {
        pthread_mutex_unlock(&dag->queue_mutex);
        return NULL;
    }

    Job* job = dag->ready_queue[dag->queue_front];
    dag->queue_front = (dag->queue_front + 1) % MAX_JOBS;
    dag->queue_size--;

    pthread_mutex_unlock(&dag->queue_mutex);
    return job;
}

static void execute_job(Job* job, DAG* dag) {
    printf("[%s] Запуск: %s\n", job->name, job->command);

    pid_t pid = fork();

    if (pid == -1) {
```

```
        perror("fork failed");

        pthread_mutex_lock(&dag->mutex);
        job->status = JOB_FAILED;
        job->exit_code = -1;
        dag->has_failure = true;
        dag_stop(dag);
        pthread_mutex_unlock(&dag->mutex);

        return;
    }
    else if (pid == 0) {
        execl("/bin/sh", "sh", "-c", job->command, NULL);
        perror("execl failed");
        exit(EXIT_FAILURE);
    }
    else {
        int status;
        waitpid(pid, &status, 0);

        pthread_mutex_lock(&dag->mutex);

        if (WIFEXITED(status)) {
            job->exit_code = WEXITSTATUS(status);
            if (job->exit_code == 0) {
                job->status = JOB_SUCCESS;
                printf("[%s] Успешно завершен\n", job->name);
            } else {
                job->status = JOB_FAILED;
                printf("[%s] Завершен с ошибкой (код: %d)\n", job->name, job->exit_code);
                dag->has_failure = true;
                dag_stop(dag);
```

```
            }
        } else {
            job->status = JOB_FAILED;
            job->exit_code = -1;
            printf("[%s] Завершен аварийно\n", job->name);
            dag->has_failure = true;
            dag_stop(dag);
        }

        pthread_mutex_unlock(&dag->mutex);
    }
}


static void* worker_thread(void* arg) {
    DAG* dag = (DAG*)arg;

    while (1) {
        Job* job = dequeue_job(dag);
        if (!job) break;

        pthread_mutex_lock(&dag->mutex);
        if (dag->has_failure || dag->stop_requested) {
            pthread_mutex_unlock(&dag->mutex);
            break;
        }
        job->status = JOB_RUNNING;
        pthread_mutex_unlock(&dag->mutex);

        execute_job(job, dag);

        pthread_mutex_lock(&dag->mutex);
```

```
    if (job->status == JOB_SUCCESS && !dag->has_failure) {
        for (int i = 0; i < job->dep_on_count; i++) {
            Job* dependent = job->dependents[i];

            bool all_deps_done = true;
            for (int j = 0; j < dependent->dep_count; j++) {
                if (dependent->dependencies[j]->status != JOB_SUCCESS) {
                    all_deps_done = false;
                    break;
                }
            }

            if (all_deps_done && dependent->status == JOB_PENDING) {
                dependent->status = JOB_READY;
                enqueue_job(dag, dependent);
            }
        }
    }

    bool all_completed = true;
    for (int i = 0; i < dag->job_count; i++) {
        if (dag->jobs[i]->status != JOB_SUCCESS &&
            dag->jobs[i]->status != JOB_FAILED) {
            all_completed = false;
            break;
        }
    }

    if (all_completed) {
        dag->all_jobs_completed = true;
        pthread_mutex_lock(&dag->queue_mutex);
        pthread_cond_broadcast(&dag->queue_cond);
```

```
            pthread_mutex_unlock(&dag->queue_mutex);
        }

        pthread_mutex_unlock(&dag->mutex);
    }

    return NULL;
}


void dag_stop(DAG* dag) {
    if (!dag) return;

    pthread_mutex_lock(&dag->queue_mutex);
    dag->stop_requested = true;
    pthread_cond_broadcast(&dag->queue_cond);
    pthread_mutex_unlock(&dag->queue_mutex);
}


void dag_execute(DAG* dag) {
    if (!dag_validate(dag)) {
        fprintf(stderr, "Невозможно выполнить некорректный DAG\n");
        return;
    }

    printf("Запуск планировщика DAG...\n");

    int start_count;
    Job** start_jobs = get_start_jobs(dag, &start_count);

    for (int i = 0; i < start_count; i++) {
```

```
    start_jobs[i]->status = JOB_READY;
    enqueue_job(dag, start_jobs[i]);
}
free(start_jobs);

int num_workers = sysconf(_SC_NPROCESSORS_ONLN);
if (num_workers < 1) num_workers = 2;

printf("Используется %d рабочих потоков\n", num_workers);

pthread_t* workers = (pthread_t*)malloc(num_workers * sizeof(pthread_t));

for (int i = 0; i < num_workers; i++) {
    pthread_create(&workers[i], NULL, worker_thread, dag);
}

for (int i = 0; i < num_workers; i++) {
    pthread_join(workers[i], NULL);
}

free(workers);

printf("\nСтатистика выполнения:\n");
printf("======================\n");

int success_count = 0, failed_count = 0, pending_count = 0;

for (int i = 0; i < dag->job_count; i++) {
    switch (dag->jobs[i]->status) {
        case JOB_SUCCESS:
            success_count++;
            printf("[%s] ✓ Успешно\n", dag->jobs[i]->name);
```

```
                break;
            case JOB_FAILED:
                failed_count++;
                printf("[%s] ✗ Ошибка (код: %d)\n",
                       dag->jobs[i]->name, dag->jobs[i]->exit_code);
                break;
            case JOB_PENDING:
                pending_count++;
                printf("[%s] ○ Не выполнен\n", dag->jobs[i]->name);
                break;
            default:
                printf("[%s] ? Неизвестный статус\n", dag->jobs[i]->name);
        }
    }

    printf("\nИтого: %d успешно, %d с ошибкой, %d не выполнено\n",
           success_count, failed_count, pending_count);

    if (dag->has_failure) {
        printf("\nDAG остановлен из-за ошибки в одном из джобов!\n");
    }
}


void trim_string(char* str) {
    if (!str) return;

    char* start = str;
    while (isspace((unsigned char)*start)) start++;

    char* end = str + strlen(str) - 1;
    while (end > start && isspace((unsigned char)*end)) end--;
```

```
    memmove(str, start, end - start + 1);
    str[end - start + 1] = '\0';
}


bool parse_ini(const char* filename, DAG* dag) {
    FILE* file = fopen(filename, "r");
    if (!file) {
        fprintf(stderr, "Не могу открыть файл: %s\n", filename);
        return false;
    }

    char line[512];
    char current_section[50] = "";

    char job_names[MAX_JOBS][MAX_NAME_LEN];
    char job_commands[MAX_JOBS][MAX_CMD_LEN];
    int job_count = 0;

    char dependencies[MAX_JOBS][MAX_DEPS][MAX_NAME_LEN];
    int dep_counts[MAX_JOBS] = {0};

    while (fgets(line, sizeof(line), file)) {
        line[strcspn(line, "\n")] = '\0';
        trim_string(line);

        if (strlen(line) == 0 || line[0] == ';' || line[0] == '#') {
            continue;
        }

        if (line[0] == '[' && strchr(line, ']')) {
```

```
            char* end_bracket = strchr(line, ']');
            *end_bracket = '\0';
            strcpy(current_section, line + 1);
            continue;
        }

        char* equals = strchr(line, '=');
        if (equals) {
            *equals = '\0';
            char* key = line;
            char* value = equals + 1;

            trim_string(key);
            trim_string(value);

            if (strcmp(current_section, "jobs") == 0) {
                if (job_count < MAX_JOBS) {
                    strcpy(job_names[job_count], key);
                    strcpy(job_commands[job_count], value);
                    job_count++;
                }
            }
            else if (strcmp(current_section, "dependencies") == 0) {
                int job_index = -1;
                for (int i = 0; i < job_count; i++) {
                    if (strcmp(job_names[i], key) == 0) {
                        job_index = i;
                        break;
                    }
                }

                if (job_index != -1 && dep_counts[job_index] < MAX_DEPS) {
```

```
            char* dep = strtok(value, ",");
            while (dep != NULL && dep_counts[job_index] < MAX_DEPS) {
                trim_string(dep);
                strcpy(dependencies[job_index][dep_counts[job_index]], dep);
                dep_counts[job_index]++;
                dep = strtok(NULL, ",");
            }
        }
    }
}

fclose(file);

for (int i = 0; i < job_count; i++) {
    if (!dag_add_job(dag, job_names[i], job_commands[i])) {
        fprintf(stderr, "Ошибка добавления джоба: %s\n", job_names[i]);
        return false;
    }
}

for (int i = 0; i < job_count; i++) {
    for (int j = 0; j < dep_counts[i]; j++) {
        if (!dag_add_dependency(dag, dependencies[i][j], job_names[i])) {
            fprintf(stderr, "Ошибка добавления зависимости: %s -> %s\n",
                dependencies[i][j], job_names[i]);
            return false;
        }
    }
}

printf("Успешно загружено %d джобов из %s\n", job_count, filename);
```

```
    return true;
}
```

Протокол работы программы

./dag_scheduler example2.ini

Планировщик DAG джобов

==========

Успешно загружено 6 джобов из example2.ini

DAG корректен. Стартовых джобов: 1, Завершающих: 1

Запуск планировщика DAG...

Используется 12 рабочих потоков

[job_a] Запуск: echo "Стартовый джоб A"

Стартовый джоб A

[job_a] Успешно завершен

[job_b] Запуск: sleep 1 && echo "Джоб B после паузы"

[job_c] Запуск: echo "Джоб C выполняется параллельно с B"

Джоб C выполняется параллельно с B

[job_c] Успешно завершен

Джоб B после паузы

[job_b] Успешно завершен

[job_d] Запуск: /bin/false

[job_d] Завершен с ошибкой (код: 1)

Статистика выполнения:

==========

[job_a] ✓ Успешно

[job_b] ✓ Успешно

[job_c] ✓ Успешно

[job_d] ✗ Ошибка (код: 1)

[job_e] ○ Не выполнен

[job_f] ○ Не выполнен

Итого: 3 успешно, 1 с ошибкой, 2 не выполнено

DAG остановлен из-за ошибки в одном из джобов!

strace -f -o strace_output.txt ./dag_scheduler example2.ini

strace_output.txt

1361 execve("./dag_scheduler", ["./dag_scheduler", "example2.ini"], 0x7ffd43369940 /* 27 vars */) = 0

1361 brk(NULL) = 0x63212a6f5000

1361 arch_prctl(0x3001 /* ARCH_??? */, 0x7ffcc001ce80) = -1 EINVAL (Invalid argument)

1361 mmap(NULL, 8192, PROT_READ|PROT_WRITE, MAP_PRIVATE|MAP_ANONYMOUS, -1, 0) = 0x7e85fbed5000

1361 access("/etc/ld.so.preload", R_OK) = -1 ENOENT (No such file or directory)

1361 openat(AT_FDCWD, "/etc/ld.so.cache", O_RDONLY|O_CLOEXEC) = 3

1361 newfstatat(3, "", {st_mode=S_IFREG|0644, st_size=61360, ...}, AT_EMPTY_PATH) = 0

1361 mmap(NULL, 61360, PROT_READ, MAP_PRIVATE, 3, 0) = 0x7e85fbec6000

1361 close(3) = 0

1361 openat(AT_FDCWD, "/lib/x86_64-linux-gnu/libc.so.6", O_RDONLY|O_CLOEXEC) = 3

1361 read(3, "\177ELF\2\1\1\3\0\0\0\0\0\0\0\0\3\0>\0\1\0\0\0P\237\2\0\0\0\0\0"..., 832) = 832

1361 pread64(3, "\6\0\0\0\4\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0"..., 784, 64) = 784

1361 pread64(3, "\4\0\0\0 \0\0\0\5\0\0\0GNU\0\2\0\0\300\4\0\0\0\3\0\0\0\0\0\0\0"..., 48, 848) = 48

1361 pread64(3, "\4\0\0\0\24\0\0\0\3\0\0\0GNU\0O{\f\225\ \=\201\327\312\301P\32$\230\266\235"..., 68, 896) = 68

1361 newfstatat(3, "", {st_mode=S_IFREG|0755, st_size=2220400, ...}, AT_EMPTY_PATH) = 0

1361 pread64(3, "\6\0\0\0\4\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0"..., 784, 64) = 784

1361 mmap(NULL, 2264656, PROT_READ, MAP_PRIVATE|MAP_DENYWRITE, 3, 0) = 0x7e85fbc00000

1361 mprotect(0x7e85fbc28000, 2023424, PROT_NONE) = 0

1361 mmap(0x7e85fbc28000, 1658880, PROT_READ|PROT_EXEC, MAP_PRIVATE|MAP_FIXED|MAP_DENYWRITE, 3, 0x28000) = 0x7e85fbc28000

1361 mmap(0x7e85fbdbd000, 360448, PROT_READ, MAP_PRIVATE|MAP_FIXED|MAP_DENYWRITE, 3, 0x1bd000) = 0x7e85fbdbd000

1361 mmap(0x7e85fbe16000, 24576, PROT_READ|PROT_WRITE, MAP_PRIVATE|MAP_FIXED|MAP_DENYWRITE, 3, 0x215000) = 0x7e85fbe16000

1361 mmap(0x7e85fbe1c000, 52816, PROT_READ|PROT_WRITE, MAP_PRIVATE|MAP_FIXED|MAP_ANONYMOUS, -1, 0) = 0x7e85fbe1c000

1361 close(3) = 0

1361 mmap(NULL, 12288, PROT_READ|PROT_WRITE, MAP_PRIVATE| MAP_ANONYMOUS, -1, 0) = 0x7e85fbec3000

1361 arch_prctl(ARCH_SET_FS, 0x7e85fbec3740) = 0

1361 set_tid_address(0x7e85fbec3a10) = 1361

1361 set_robust_list(0x7e85fbec3a20, 24) = 0

1361 rseq(0x7e85fbec40e0, 0x20, 0, 0x53053053) = 0

1361 mprotect(0x7e85fbe16000, 16384, PROT_READ) = 0

1361 mprotect(0x632115361000, 4096, PROT_READ) = 0

1361 mprotect(0x7e85fbf0f000, 8192, PROT_READ) = 0

1361 prlimit64(0, RLIMIT_STACK, NULL, {rlim_cur=8192*1024, rlim_max=RLIM64_INFINITY}) = 0

1361 munmap(0x7e85fbec6000, 61360) = 0

1361 newfstatat(1, "", {st_mode=S_IFCHR|0600, st_rdev=makedev(0x88, 0x2), ...}, AT_EMPTY_PATH) = 0

1361 getrandom("\x18\x39\xcc\x22\x1e\x66\xf3\x02", 8, GRND_NONBLOCK) = 8

1361 brk(NULL) = 0x63212a6f5000

1361 brk(0x63212a716000) = 0x63212a716000

1361 write(1, "\320\237\320\273\320\260\320\275\320\270\321\200\320\276\320\262\321\211\320\270\320\272 DAG \320\264\320\266\320"..., 40) = 40

1361 write(1, "======================\n", 23) = 23

1361 openat(AT_FDCWD, "example2.ini", O_RDONLY) = 3

1361 newfstatat(3, "", {st_mode=S_IFREG|0777, st_size=503, ...}, AT_EMPTY_PATH) = 0

1361 read(3, "[jobs]\r\njob_a = echo \"\320\241\321\202\320\260\321\200\321\202"..., 4096) = 503

1361 read(3, "", 4096) = 0

1361 close(3) = 0

1361 write(1, "\320\243\321\201\320\277\320\265\321\210\320\275\320\276 \320\267\320\260\320\263\321\200\321\203\320\266\320\265\320\275\320"..., 67) = 67

1361 write(1, "DAG \320\272\320\276\321\200\321\200\320\265\320\272\321\202\320\265\320\275. \320\241\321\202\320\260\321\200"..., 86) = 86

1361 write(1, "\320\227\320\260\320\277\321\203\321\201\320\272 \320\277\320\273\320\260\320\275\320\270\321\200\320\276\320\262\321\211\320"..., 45) = 45

1361 openat(AT_FDCWD, "/sys/devices/system/cpu/online", O_RDONLY| O_CLOEXEC) = 3

1361 read(3, "0-11\n", 1024) = 5

1361 close(3) = 0

1361 write(1, "\320\230\321\201\320\277\320\276\320\273\321\214\320\267\321\203\320\265\321\202 \321\201\321\217 12 \321\200\320\260"..., 58) = 58

1361 rt_sigaction(SIGRT_1, {sa_handler=0x7e85fbc91870, sa_mask=[], sa_flags=SA_RESTORER|SA_ONSTACK|SA_RESTART|SA_SIGINFO, sa_restorer=0x7e85fbc42520}, NULL, 8) = 0

1361 rt_sigprocmask(SIG_UNBLOCK, [RTMIN RT_1], NULL, 8) = 0

1361 mmap(NULL, 8392704, PROT_NONE, MAP_PRIVATE| MAP_ANONYMOUS|MAP_STACK, -1, 0) = 0x7e85fb3ff000

1361 mprotect(0x7e85fb400000, 8388608, PROT_READ|PROT_WRITE) = 0

1361 rt_sigprocmask(SIG_BLOCK, ~[], [], 8) = 0

1361 clone3({flags=CLONE_VM|CLONE_FS|CLONE_FILES|
CLONE_SIGHAND|CLONE_THREAD|CLONE_SYSVSEM|CLONE_SETTLS|
CLONE_PARENT_SETTID|CLONE_CHILD_CLEARTID, child_tid=0x7e85fbbff910,
parent_tid=0x7e85fbbff910, exit_signal=0, stack=0x7e85fb3ff000, stack_size=0x7fff00,
tls=0x7e85fbbff640} => {parent_tid=[1362]}, 88) = 1362

1361 rt_sigprocmask(SIG_SETMASK, [], <unfinished ...>

1362 rseq(0x7e85fbbfffe0, 0x20, 0, 0x53053053 <unfinished ...>

1361 <... rt_sigprocmask resumed>NULL, 8) = 0

1362 <... rseq resumed>) = 0

1361 mmap(NULL, 8392704, PROT_NONE, MAP_PRIVATE|
MAP_ANONYMOUS|MAP_STACK, -1, 0 <unfinished ...>

1362 set_robust_list(0x7e85fbbff920, 24 <unfinished ...>

1361 <... mmap resumed>) = 0x7e85fabfe000

1362 <... set_robust_list resumed>) = 0

1361 mprotect(0x7e85fabff000, 8388608, PROT_READ|PROT_WRITE
<unfinished ...>

1362 rt_sigprocmask(SIG_SETMASK, [], <unfinished ...>

1361 <... mprotect resumed>)   = 0

1362 <... rt_sigprocmask resumed>NULL, 8) = 0

1361 rt_sigprocmask(SIG_BLOCK, ~[], <unfinished ...>

1362 write(1, "[job_a] \320\227\320\260\320\277\321\203\321\201\320\272: echo \"\320\241\321\202"..., 59 <unfinished ...>

1361 <... rt_sigprocmask resumed>[], 8) = 0

1362 <... write resumed>)   = 59

1361 clone3({flags=CLONE_VM|CLONE_FS|CLONE_FILES|CLONE_SIGHAND|CLONE_THREAD|CLONE_SYSVSEM|CLONE_SETTLS|CLONE_PARENT_SETTID|CLONE_CHILD_CLEARTID, child_tid=0x7e85fb3fe910, parent_tid=0x7e85fb3fe910, exit_signal=0, stack=0x7e85fabfe000, stack_size=0x7fff00, tls=0x7e85fb3fe640} <unfinished ...>

1362 clone(child_stack=NULL, flags=CLONE_CHILD_CLEARTID|CLONE_CHILD_SETTID|SIGCHLD <unfinished ...>

1361 <... clone3 resumed> => {parent_tid=[1363]}, 88) = 1363

1363 rseq(0x7e85fb3fefe0, 0x20, 0, 0x53053053 <unfinished ...>

1361 rt_sigprocmask(SIG_SETMASK, [], NULL, 8) = 0

1363 <... rseq resumed>) = 0

1361 mmap(NULL, 8392704, PROT_NONE, MAP_PRIVATE|MAP_ANONYMOUS|MAP_STACK, -1, 0 <unfinished ...>

1364 set_robust_list(0x7e85fbbff920, 24 <unfinished ...>

1362 <... clone resumed>, child_tidptr=0x7e85fbbff910) = 1364

1361 <... mmap resumed>) = 0x7e85fa3fd000

1364 <... set_robust_list resumed>) = 0

1363 set_robust_list(0x7e85fb3fe920, 24 <unfinished ...>

1361 mprotect(0x7e85fa3fe000, 8388608, PROT_READ|PROT_WRITE <unfinished ...>

1364 execve("/bin/sh", ["sh", "-c", "echo \"\320\241\321\202\320\260\321\200\321\202\320\276\320\262\321\213\320\271\320\264\320\266\320\276\320"...], 0x7ffcc001d060 /* 27 vars */ <unfinished ...>

1362 wait4(1364, <unfinished ...>

1361 <... mprotect resumed>) = 0

1363 <... set_robust_list resumed>) = 0

1361 rt_sigprocmask(SIG_BLOCK, ~[], [], 8) = 0

1363 rt_sigprocmask(SIG_SETMASK, [], <unfinished ...>

1361 clone3({flags=CLONE_VM|CLONE_FS|CLONE_FILES|
CLONE_SIGHAND|CLONE_THREAD|CLONE_SYSVSEM|CLONE_SETTLS|
CLONE_PARENT_SETTID|CLONE_CHILD_CLEARTID, child_tid=0x7e85fabfd910,
parent_tid=0x7e85fabfd910, exit_signal=0, stack=0x7e85fa3fd000, stack_size=0x7fff00,
tls=0x7e85fabfd640} <unfinished ...>

1364 <... execve resumed>) = 0

1363 <... rt_sigprocmask resumed>NULL, 8) = 0

1361 <... clone3 resumed> => {parent_tid=[1365]}, 88) = 1365

1365 rseq(0x7e85fabfdfe0, 0x20, 0, 0x53053053 <unfinished ...>

1364 brk(NULL <unfinished ...>

1361 rt_sigprocmask(SIG_SETMASK, [], <unfinished ...>

1365 <... rseq resumed>) = 0

1363 futex(0x63212a6f5a58, FUTEX_WAIT_BITSET_PRIVATE|
FUTEX_CLOCK_REALTIME, 0, NULL, FUTEX_BITSET_MATCH_ANY
<unfinished ...>

1361 <... rt_sigprocmask resumed>NULL, 8) = 0

1365 set_robust_list(0x7e85fabfd920, 24 <unfinished ...>

1364 <... brk resumed>) = 0x61da4f7d7000

1361 mmap(NULL, 8392704, PROT_NONE, MAP_PRIVATE|MAP_ANONYMOUS|MAP_STACK, -1, 0 <unfinished ...>

1365 <... set_robust_list resumed>) = 0

1361 <... mmap resumed>) = 0x7e85f9bfc000

1364 arch_prctl(0x3001 /* ARCH_??? */, 0x7ffce0f32960 <unfinished ...>

1361 mprotect(0x7e85f9bfd000, 8388608, PROT_READ|PROT_WRITE <unfinished ...>

1365 rt_sigprocmask(SIG_SETMASK, [], <unfinished ...>

1361 <... mprotect resumed>) = 0

1364 <... arch_prctl resumed>) = -1 EINVAL (Invalid argument)

1361 rt_sigprocmask(SIG_BLOCK, ~[], <unfinished ...>

1365 <... rt_sigprocmask resumed>NULL, 8) = 0

1361 <... rt_sigprocmask resumed>[], 8) = 0

1364 mmap(NULL, 8192, PROT_READ|PROT_WRITE, MAP_PRIVATE|MAP_ANONYMOUS, -1, 0 <unfinished ...>

1361 clone3({flags=CLONE_VM|CLONE_FS|CLONE_FILES|CLONE_SIGHAND|CLONE_THREAD|CLONE_SYSVSEM|CLONE_SETTLS|CLONE_PARENT_SETTID|CLONE_CHILD_CLEARTID, child_tid=0x7e85fa3fc910, parent_tid=0x7e85fa3fc910, exit_signal=0, stack=0x7e85f9bfc000, stack_size=0x7fff00, tls=0x7e85fa3fc640} <unfinished ...>

1365 futex(0x63212a6f5a58, FUTEX_WAIT_BITSET_PRIVATE|FUTEX_CLOCK_REALTIME, 0, NULL, FUTEX_BITSET_MATCH_ANY <unfinished ...>

1364 <... mmap resumed>) = 0x741b3ea91000

1361 <... clone3 resumed> => {parent_tid=[1366]}, 88) = 1366

1366 rseq(0x7e85fa3fcfe0, 0x20, 0, 0x53053053 <unfinished ...>

1361 rt_sigprocmask(SIG_SETMASK, [], <unfinished ...>

1364 access("/etc/ld.so.preload", R_OK <unfinished ...>

1361 <... rt_sigprocmask resumed>NULL, 8) = 0

1366 <... rseq resumed>) = 0

1361 mmap(NULL, 8392704, PROT_NONE, MAP_PRIVATE|MAP_ANONYMOUS|MAP_STACK, -1, 0 <unfinished ...>

1364 <... access resumed>) = -1 ENOENT (No such file or directory)

1361 <... mmap resumed>) = 0x7e85f93fb000

1366 set_robust_list(0x7e85fa3fc920, 24 <unfinished ...>

1361 mprotect(0x7e85f93fc000, 8388608, PROT_READ|PROT_WRITE <unfinished ...>

1364 openat(AT_FDCWD, "/etc/ld.so.cache", O_RDONLY|O_CLOEXEC <unfinished ...>

1361 <... mprotect resumed>) = 0

1366 <... set_robust_list resumed>) = 0

1361 rt_sigprocmask(SIG_BLOCK, ~[], <unfinished ...>

1364 <... openat resumed>) = 3

1361 <... rt_sigprocmask resumed>[], 8) = 0

1366 rt_sigprocmask(SIG_SETMASK, [], <unfinished ...>

1361 clone3({flags=CLONE_VM|CLONE_FS|CLONE_FILES|
CLONE_SIGHAND|CLONE_THREAD|CLONE_SYSVSEM|CLONE_SETTLS|
CLONE_PARENT_SETTID|CLONE_CHILD_CLEARTID, child_tid=0x7e85f9bfb910,
parent_tid=0x7e85f9bfb910, exit_signal=0, stack=0x7e85f93fb000, stack_size=0x7fff00,
tls=0x7e85f9bfb640} <unfinished ...>

1364 newfstatat(3, "", <unfinished ...>

1366 <... rt_sigprocmask resumed>NULL, 8) = 0

1361 <... clone3 resumed> => {parent_tid=[1367]}, 88) = 1367

1367 rseq(0x7e85f9bfbfe0, 0x20, 0, 0x53053053 <unfinished ...>

1364 <... newfstatat resumed>{st_mode=S_IFREG|0644, st_size=61360, ...},
AT_EMPTY_PATH) = 0

1361 rt_sigprocmask(SIG_SETMASK, [], <unfinished ...>

1367 <... rseq resumed>) = 0

1366 futex(0x63212a6f5a58, FUTEX_WAIT_BITSET_PRIVATE|
FUTEX_CLOCK_REALTIME, 0, NULL, FUTEX_BITSET_MATCH_ANY
<unfinished ...>

1361 <... rt_sigprocmask resumed>NULL, 8) = 0

1367 set_robust_list(0x7e85f9bfb920, 24 <unfinished ...>

1364 mmap(NULL, 61360, PROT_READ, MAP_PRIVATE, 3, 0 <unfinished ...>

1361 mmap(NULL, 8392704, PROT_NONE, MAP_PRIVATE|MAP_ANONYMOUS|MAP_STACK, -1, 0 <unfinished ...>

1367 <... set_robust_list resumed>) = 0

1361 <... mmap resumed>) = 0x7e85f8bfa000

1364 <... mmap resumed>) = 0x741b3ea82000

1361 mprotect(0x7e85f8bfb000, 8388608, PROT_READ|PROT_WRITE <unfinished ...>

1367 rt_sigprocmask(SIG_SETMASK, [], <unfinished ...>

1361 <... mprotect resumed>) = 0

1364 close(3 <unfinished ...>

1361 rt_sigprocmask(SIG_BLOCK, ~[], <unfinished ...>

1367 <... rt_sigprocmask resumed>NULL, 8) = 0

1361 <... rt_sigprocmask resumed>[], 8) = 0

1364 <... close resumed>) = 0

1361 clone3({flags=CLONE_VM|CLONE_FS|CLONE_FILES|
CLONE_SIGHAND|CLONE_THREAD|CLONE_SYSVSEM|CLONE_SETTLS|
CLONE_PARENT_SETTID|CLONE_CHILD_CLEARTID, child_tid=0x7e85f93fa910,
parent_tid=0x7e85f93fa910, exit_signal=0, stack=0x7e85f8bfa000, stack_size=0x7fff00,
tls=0x7e85f93fa640} <unfinished ...>

1367 futex(0x63212a6f5a58, FUTEX_WAIT_BITSET_PRIVATE|
FUTEX_CLOCK_REALTIME, 0, NULL, FUTEX_BITSET_MATCH_ANY
<unfinished ...>

1364 openat(AT_FDCWD, "/lib/x86_64-linux-gnu/libc.so.6", O_RDONLY|
O_CLOEXEC <unfinished ...>

1361 <... clone3 resumed> => {parent_tid=[1368]}, 88) = 1368

1368 rseq(0x7e85f93fafe0, 0x20, 0, 0x53053053 <unfinished ...>

1361 rt_sigprocmask(SIG_SETMASK, [], <unfinished ...>

1364 <... openat resumed>) = 3

1361 <... rt_sigprocmask resumed>NULL, 8) = 0

1368 <... rseq resumed>) = 0

1361 mmap(NULL, 8392704, PROT_NONE, MAP_PRIVATE|
MAP_ANONYMOUS|MAP_STACK, -1, 0 <unfinished ...>

1364 read(3, <unfinished ...>

1361 <... mmap resumed>) = 0x7e85f83f9000

1368 set_robust_list(0x7e85f93fa920, 24 <unfinished ...>

1361 mprotect(0x7e85f83fa000, 8388608, PROT_READ|PROT_WRITE <unfinished ...>

1364 <... read resumed>"\177ELF\2\1\1\3\0\0\0\0\0\0\0\0\3\0>\0\1\0\0\0P\237\2\0\0\0\0"..., 832) = 832

1361 <... mprotect resumed>) = 0

1368 <... set_robust_list resumed>) = 0

1361 rt_sigprocmask(SIG_BLOCK, ~[], <unfinished ...>

1364 pread64(3, <unfinished ...>

1361 <... rt_sigprocmask resumed>[], 8) = 0

1368 rt_sigprocmask(SIG_SETMASK, [], <unfinished ...>

1361 clone3({flags=CLONE_VM|CLONE_FS|CLONE_FILES|CLONE_SIGHAND|CLONE_THREAD|CLONE_SYSVSEM|CLONE_SETTLS|CLONE_PARENT_SETTID|CLONE_CHILD_CLEARTID, child_tid=0x7e85f8bf9910, parent_tid=0x7e85f8bf9910, exit_signal=0, stack=0x7e85f83f9000, stack_size=0x7fff00, tls=0x7e85f8bf9640} <unfinished ...>

1364 <... pread64 resumed>"\6\0\0\0\4\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0"..., 784, 64) = 784

1368 <... rt_sigprocmask resumed>NULL, 8) = 0

1361 <... clone3 resumed> => {parent_tid=[1369]}, 88) = 1369

1369 rseq(0x7e85f8bf9fe0, 0x20, 0, 0x53053053 <unfinished ...>

1364 pread64(3, <unfinished ...>

1361 rt_sigprocmask(SIG_SETMASK, [], <unfinished ...>

1369 <... rseq resumed>) = 0

1368 futex(0x63212a6f5a58, FUTEX_WAIT_BITSET_PRIVATE|FUTEX_CLOCK_REALTIME, 0, NULL, FUTEX_BITSET_MATCH_ANY <unfinished ...>

1361 <... rt_sigprocmask resumed>NULL, 8) = 0

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1369  set_robust_list(0x7e85f8bf9920, 24 <unfinished ...>
1364  <... pread64 resumed>"\4\0\0\0
\0\0\0\5\0\0\0GNU\0\2\0\0\300\4\0\0\0\3\0\0\0\0\0\0\0"..., 48, 848) = 48
1361  mmap(NULL, 8392704, PROT_NONE, MAP_PRIVATE|
MAP_ANONYMOUS|MAP_STACK, -1, 0 <unfinished ...>
1369  <... set_robust_list resumed>)    = 0
1361  <... mmap resumed>)               = 0x7e85f7bf8000
1364  pread64(3,  <unfinished ...>
1361  mprotect(0x7e85f7bf9000, 8388608, PROT_READ|PROT_WRITE
<unfinished ...>
1369  rt_sigprocmask(SIG_SETMASK, [],  <unfinished ...>
1361  <... mprotect resumed>)           = 0
1364  <... pread64 resumed>"\4\0\0\0\24\0\0\0\3\0\0\0GNU\0O{\f\225\
\=\201\327\312\301P\32$\230\266\235"..., 68, 896) = 68
1361  rt_sigprocmask(SIG_BLOCK, ~[],  <unfinished ...>
1369  <... rt_sigprocmask resumed>NULL, 8) = 0
1361  <... rt_sigprocmask resumed>[], 8) = 0
1364  newfstatat(3, "",  <unfinished ...>
1361  clone3({flags=CLONE_VM|CLONE_FS|CLONE_FILES|
CLONE_SIGHAND|CLONE_THREAD|CLONE_SYSVSEM|CLONE_SETTLS|
CLONE_PARENT_SETTID|CLONE_CHILD_CLEARTID, child_tid=0x7e85f83f8910,
parent_tid=0x7e85f83f8910, exit_signal=0, stack=0x7e85f7bf8000, stack_size=0x7fff00,
tls=0x7e85f83f8640} <unfinished ...>
1369  futex(0x63212a6f5a58, FUTEX_WAIT_BITSET_PRIVATE|
FUTEX_CLOCK_REALTIME, 0, NULL, FUTEX_BITSET_MATCH_ANY
<unfinished ...>
1364  <... newfstatat resumed>{st_mode=S_IFREG|0755, st_size=2220400, ...},
AT_EMPTY_PATH) = 0
1361  <... clone3 resumed> => {parent_tid=[1370]}, 88) = 1370
1370  rseq(0x7e85f83f8fe0, 0x20, 0, 0x53053053 <unfinished ...>
1361  rt_sigprocmask(SIG_SETMASK, [],  <unfinished ...>
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1364 pread64(3, <unfinished ...>

1361 <... rt_sigprocmask resumed>NULL, 8) = 0

1370 <... rseq resumed>) = 0

1361 mmap(NULL, 8392704, PROT_NONE, MAP_PRIVATE|MAP_ANONYMOUS|MAP_STACK, -1, 0 <unfinished ...>

1364 <... pread64 resumed>"\6\0\0\0\4\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0"..., 784, 64) = 784

1361 <... mmap resumed>) = 0x7e85f73f7000

1370 set_robust_list(0x7e85f83f8920, 24 <unfinished ...>

1361 mprotect(0x7e85f73f8000, 8388608, PROT_READ|PROT_WRITE <unfinished ...>

1364 mmap(NULL, 2264656, PROT_READ, MAP_PRIVATE|MAP_DENYWRITE, 3, 0 <unfinished ...>

1361 <... mprotect resumed>) = 0

1370 <... set_robust_list resumed>) = 0

1361 rt_sigprocmask(SIG_BLOCK, ~[], <unfinished ...>

1364 <... mmap resumed>) = 0x741b3e800000

1361 <... rt_sigprocmask resumed>[], 8) = 0

1370 rt_sigprocmask(SIG_SETMASK, [], <unfinished ...>

1361 clone3({flags=CLONE_VM|CLONE_FS|CLONE_FILES|CLONE_SIGHAND|CLONE_THREAD|CLONE_SYSVSEM|CLONE_SETTLS|CLONE_PARENT_SETTID|CLONE_CHILD_CLEARTID, child_tid=0x7e85f7bf7910, parent_tid=0x7e85f7bf7910, exit_signal=0, stack=0x7e85f73f7000, stack_size=0x7fff00, tls=0x7e85f7bf7640} <unfinished ...>

1364 mprotect(0x741b3e828000, 2023424, PROT_NONE <unfinished ...>

1370 <... rt_sigprocmask resumed>NULL, 8) = 0

1361 <... clone3 resumed> => {parent_tid=[1371]}, 88) = 1371

1371 rseq(0x7e85f7bf7fe0, 0x20, 0, 0x53053053 <unfinished ...>

1364 <... mprotect resumed>) = 0

1361 rt_sigprocmask(SIG_SETMASK, [], <unfinished ...>

1371 <... rseq resumed>) = 0

1370 futex(0x63212a6f5a58, FUTEX_WAIT_BITSET_PRIVATE| FUTEX_CLOCK_REALTIME, 0, NULL, FUTEX_BITSET_MATCH_ANY <unfinished ...>

1361 <... rt_sigprocmask resumed>NULL, 8) = 0

1371 set_robust_list(0x7e85f7bf7920, 24 <unfinished ...>

1364 mmap(0x741b3e828000, 1658880, PROT_READ|PROT_EXEC, MAP_PRIVATE|MAP_FIXED|MAP_DENYWRITE, 3, 0x28000 <unfinished ...>

1361 mmap(NULL, 8392704, PROT_NONE, MAP_PRIVATE| MAP_ANONYMOUS|MAP_STACK, -1, 0 <unfinished ...>

1371 <... set_robust_list resumed>) = 0

1361 <... mmap resumed>) = 0x7e85f6bf6000

1364 <... mmap resumed>) = 0x741b3e828000

1361 mprotect(0x7e85f6bf7000, 8388608, PROT_READ|PROT_WRITE <unfinished ...>

1371 rt_sigprocmask(SIG_SETMASK, [], <unfinished ...>

1361 <... mprotect resumed>) = 0

1364 mmap(0x741b3e9bd000, 360448, PROT_READ, MAP_PRIVATE| MAP_FIXED|MAP_DENYWRITE, 3, 0x1bd000 <unfinished ...>

1361 rt_sigprocmask(SIG_BLOCK, ~[], <unfinished ...>

1371 <... rt_sigprocmask resumed>NULL, 8) = 0

1361 <... rt_sigprocmask resumed>[], 8) = 0

1364 <... mmap resumed>) = 0x741b3e9bd000

1361 clone3({flags=CLONE_VM|CLONE_FS|CLONE_FILES| CLONE_SIGHAND|CLONE_THREAD|CLONE_SYSVSEM|CLONE_SETTLS| CLONE_PARENT_SETTID|CLONE_CHILD_CLEARTID, child_tid=0x7e85f73f6910, parent_tid=0x7e85f73f6910, exit_signal=0, stack=0x7e85f6bf6000, stack_size=0x7fff00, tls=0x7e85f73f6640} <unfinished ...>

1371 futex(0x63212a6f5a58, FUTEX_WAIT_BITSET_PRIVATE|FUTEX_CLOCK_REALTIME, 0, NULL, FUTEX_BITSET_MATCH_ANY <unfinished ...>

1364 mmap(0x741b3ea16000, 24576, PROT_READ|PROT_WRITE, MAP_PRIVATE|MAP_FIXED|MAP_DENYWRITE, 3, 0x215000 <unfinished ...>

1361 <... clone3 resumed> => {parent_tid=[1372]}, 88) = 1372

1372 rseq(0x7e85f73f6fe0, 0x20, 0, 0x53053053 <unfinished ...>

1361 rt_sigprocmask(SIG_SETMASK, [], <unfinished ...>

1364 <... mmap resumed>) = 0x741b3ea16000

1361 <... rt_sigprocmask resumed>NULL, 8) = 0

1372 <... rseq resumed>) = 0

1361 mmap(NULL, 8392704, PROT_NONE, MAP_PRIVATE|MAP_ANONYMOUS|MAP_STACK, -1, 0 <unfinished ...>

1364 mmap(0x741b3ea1c000, 52816, PROT_READ|PROT_WRITE, MAP_PRIVATE|MAP_FIXED|MAP_ANONYMOUS, -1, 0 <unfinished ...>

1361 <... mmap resumed>) = 0x7e85f63f5000

1372 set_robust_list(0x7e85f73f6920, 24 <unfinished ...>

1361 mprotect(0x7e85f63f6000, 8388608, PROT_READ|PROT_WRITE <unfinished ...>

1364 <... mmap resumed>) = 0x741b3ea1c000

1361 <... mprotect resumed>) = 0

1372 <... set_robust_list resumed>) = 0

1361 rt_sigprocmask(SIG_BLOCK, ~[], <unfinished ...>

1364 close(3 <unfinished ...>

1361 <... rt_sigprocmask resumed>[], 8) = 0

1372 rt_sigprocmask(SIG_SETMASK, [], <unfinished ...>

1361 clone3({flags=CLONE_VM|CLONE_FS|CLONE_FILES|CLONE_SIGHAND|CLONE_THREAD|CLONE_SYSVSEM|CLONE_SETTLS|CLONE_PARENT_SETTID|CLONE_CHILD_CLEARTID, child_tid=0x7e85f6bf5910,

parent_tid=0x7e85f6bf5910, exit_signal=0, stack=0x7e85f63f5000, stack_size=0x7fff00, tls=0x7e85f6bf5640} <unfinished ...>

1364 <... close resumed>) = 0

1372 <... rt_sigprocmask resumed>NULL, 8) = 0

1361 <... clone3 resumed> => {parent_tid=[1373]}, 88) = 1373

1373 rseq(0x7e85f6bf5fe0, 0x20, 0, 0x53053053 <unfinished ...>

1364 mmap(NULL, 12288, PROT_READ|PROT_WRITE, MAP_PRIVATE|MAP_ANONYMOUS, -1, 0 <unfinished ...>

1361 rt_sigprocmask(SIG_SETMASK, [], <unfinished ...>

1373 <... rseq resumed>) = 0

1372 futex(0x63212a6f5a58, FUTEX_WAIT_BITSET_PRIVATE|FUTEX_CLOCK_REALTIME, 0, NULL, FUTEX_BITSET_MATCH_ANY <unfinished ...>

1361 <... rt_sigprocmask resumed>NULL, 8) = 0

1373 set_robust_list(0x7e85f6bf5920, 24 <unfinished ...>

1364 <... mmap resumed>) = 0x741b3ea7f000

1361 mmap(NULL, 8392704, PROT_NONE, MAP_PRIVATE|MAP_ANONYMOUS|MAP_STACK, -1, 0 <unfinished ...>

1373 <... set_robust_list resumed>) = 0

1361 <... mmap resumed>) = 0x7e85f5bf4000

1364 arch_prctl(ARCH_SET_FS, 0x741b3ea7f740 <unfinished ...>

1361 mprotect(0x7e85f5bf5000, 8388608, PROT_READ|PROT_WRITE <unfinished ...>

1373 rt_sigprocmask(SIG_SETMASK, [], <unfinished ...>

1361 <... mprotect resumed>) = 0

1364 <... arch_prctl resumed>) = 0

1361 rt_sigprocmask(SIG_BLOCK, ~[], <unfinished ...>

1373 <... rt_sigprocmask resumed>NULL, 8) = 0

1361 <... rt_sigprocmask resumed>[], 8) = 0

1364 set_tid_address(0x741b3ea7fa10 <unfinished ...>

1361 clone3({flags=CLONE_VM|CLONE_FS|CLONE_FILES|
CLONE_SIGHAND|CLONE_THREAD|CLONE_SYSVSEM|CLONE_SETTLS|
CLONE_PARENT_SETTID|CLONE_CHILD_CLEARTID, child_tid=0x7e85f63f4910,
parent_tid=0x7e85f63f4910, exit_signal=0, stack=0x7e85f5bf4000, stack_size=0x7fff00,
tls=0x7e85f63f4640} <unfinished ...>

1373 futex(0x63212a6f5a58, FUTEX_WAIT_BITSET_PRIVATE|
FUTEX_CLOCK_REALTIME, 0, NULL, FUTEX_BITSET_MATCH_ANY
<unfinished ...>

1364 <... set_tid_address resumed>) = 1364

1361 <... clone3 resumed> => {parent_tid=[1374]}, 88) = 1374

1374 rseq(0x7e85f63f4fe0, 0x20, 0, 0x53053053 <unfinished ...>

1361 rt_sigprocmask(SIG_SETMASK, [], <unfinished ...>

1364 set_robust_list(0x741b3ea7fa20, 24 <unfinished ...>

1361 <... rt_sigprocmask resumed>NULL, 8) = 0

1374 <... rseq resumed>) = 0

1361 futex(0x7e85fbbff910, FUTEX_WAIT_BITSET|
FUTEX_CLOCK_REALTIME, 1362, NULL, FUTEX_BITSET_MATCH_ANY
<unfinished ...>

1364 <... set_robust_list resumed>) = 0

1374 set_robust_list(0x7e85f63f4920, 24 <unfinished ...>

1364 rseq(0x741b3ea800e0, 0x20, 0, 0x53053053 <unfinished ...>

1374 <... set_robust_list resumed>) = 0

1364 <... rseq resumed>) = 0

1374 rt_sigprocmask(SIG_SETMASK, [], <unfinished ...>

1364 mprotect(0x741b3ea16000, 16384, PROT_READ <unfinished ...>

1374 <... rt_sigprocmask resumed>NULL, 8) = 0

1364 <... mprotect resumed>) = 0

1374 futex(0x63212a6f5a58, FUTEX_WAIT_BITSET_PRIVATE|FUTEX_CLOCK_REALTIME, 0, NULL, FUTEX_BITSET_MATCH_ANY <unfinished ...>

1364 mprotect(0x61da11811000, 8192, PROT_READ) = 0

1364 mprotect(0x741b3eacb000, 8192, PROT_READ) = 0

1364 prlimit64(0, RLIMIT_STACK, NULL, {rlim_cur=8192*1024, rlim_max=RLIM64_INFINITY}) = 0

1364 munmap(0x741b3ea82000, 61360) = 0

1364 getuid() = 0

1364 getgid() = 0

1364 getpid() = 1364

1364 rt_sigaction(SIGCHLD, {sa_handler=0x61da11807aa0, sa_mask=~[RTMIN RT_1], sa_flags=SA_RESTORER, sa_restorer=0x741b3e842520}, NULL, 8) = 0

1364 geteuid() = 0

1364 getrandom("\xed\x3a\x7a\x4f\xd7\xa9\x22\xdf", 8, GRND_NONBLOCK) = 8

1364 brk(NULL) = 0x61da4f7d7000

1364 brk(0x61da4f7f8000) = 0x61da4f7f8000

1364 getppid() = 1361

1364 newfstatat(AT_FDCWD, "/mnt/c/Users/\320\237\320\276\320\273\321\214\320\267\320\276\320\262\320\260\321\202\320\265\320\273\321\214/OneDrive/Desktop/2\320\272\321\203\321\200\321\201/Laby_OC/\320\232\321\203\321\200\321\201\320\276\320\262\320\276\320\271 \320\277\321\200\320\276\320\265\320\272\321\202/src", {st_mode=S_IFDIR|0777, st_size=4096, ...}, 0) = 0

1364 newfstatat(AT_FDCWD, ".", {st_mode=S_IFDIR|0777, st_size=4096, ...}, 0) = 0

1364 geteuid() = 0

1364 getegid() = 0

1364 rt_sigaction(SIGINT, NULL, {sa_handler=SIG_DFL, sa_mask=[], sa_flags=0}, 8) = 0

1364 rt_sigaction(SIGINT, {sa_handler=0x61da11807aa0, sa_mask=~[RTMIN RT_1], sa_flags=SA_RESTORER, sa_restorer=0x741b3e842520}, NULL, 8) = 0

1364 rt_sigaction(SIGQUIT, NULL, {sa_handler=SIG_DFL, sa_mask=[], sa_flags=0}, 8) = 0

1364 rt_sigaction(SIGQUIT, {sa_handler=SIG_DFL, sa_mask=~[RTMIN RT_1], sa_flags=SA_RESTORER, sa_restorer=0x741b3e842520}, NULL, 8) = 0

1364 rt_sigaction(SIGTERM, NULL, {sa_handler=SIG_DFL, sa_mask=[], sa_flags=0}, 8) = 0

1364 rt_sigaction(SIGTERM, {sa_handler=SIG_DFL, sa_mask=~[RTMIN RT_1], sa_flags=SA_RESTORER, sa_restorer=0x741b3e842520}, NULL, 8) = 0

1364 write(1, "\320\241\321\202\320\260\321\200\321\202\320\276\320\262\321\213\320\271 \320\264\320\266\320\276\320\261 A\n", 30) = 30

1364 exit_group(0) = ?

1364 +++ exited with 0 +++

1362 <... wait4 resumed>[{WIFEXITED(s) && WEXITSTATUS(s) == 0}], 0, NULL) = 1364

1362 --- SIGCHLD {si_signo=SIGCHLD, si_code=CLD_EXITED, si_pid=1364, si_uid=0, si_status=0, si_utime=0, si_stime=0} ---

1362 write(1, "[job_a] \320\243\321\201\320\277\320\265\321\210\320\275\320\276 \320\267\320\260\320\262\320\265\321"..., 40) = 40

1362 futex(0x63212a6f5a58, FUTEX_WAKE_PRIVATE, 1 <unfinished ...>

1363 <... futex resumed>) = 0

1362 <... futex resumed>) = 1

1363 futex(0x63212a6f5a08, FUTEX_WAKE_PRIVATE, 1 <unfinished ...>

1362 futex(0x63212a6f5a58, FUTEX_WAKE_PRIVATE, 1 <unfinished ...>

1363 <... futex resumed>) = 0

1365 <... futex resumed>) = 0

1362 <... futex resumed>) = 1

1365 futex(0x63212a6f5a08, FUTEX_WAKE_PRIVATE, 1 <unfinished ...>

1363 futex(0x63212a6f59d8, FUTEX_WAIT_PRIVATE, 2, NULL <unfinished ...>

1365 <... futex resumed>) = 0

1362 futex(0x63212a6f59d8, FUTEX_WAKE_PRIVATE, 1 <unfinished ...>

1365 write(1, "[job_c] \320\227\320\260\320\277\321\203\321\201\320\272: echo \"\320\224\320\266"..., 91 <unfinished ...>

1363 <... futex resumed>) = -1 EAGAIN (Resource temporarily unavailable)

1365 <... write resumed>) = 91

1362 <... futex resumed>) = 0

1365 clone(child_stack=NULL, flags=CLONE_CHILD_CLEARTID| CLONE_CHILD_SETTID|SIGCHLD <unfinished ...>

1363 futex(0x63212a6f59d8, FUTEX_WAKE_PRIVATE, 1 <unfinished ...>

1362 futex(0x63212a6f5a5c, FUTEX_WAIT_BITSET_PRIVATE| FUTEX_CLOCK_REALTIME, 0, NULL, FUTEX_BITSET_MATCH_ANY <unfinished ...>

1375 set_robust_list(0x7e85fabfd920, 24 <unfinished ...>

1365 <... clone resumed>, child_tidptr=0x7e85fabfd910) = 1375

1363 <... futex resumed>) = 0

1375 <... set_robust_list resumed>) = 0

1365 wait4(1375, <unfinished ...>

1375 execve("/bin/sh", ["sh", "-c", "echo \"\320\224\320\266\320\276\320\261 C \320\262\321\213\320\277\320\276\320\273\320\275\321\217\320"...], 0x7ffcc001d060 /* 27 vars */ <unfinished ...>

1363 write(1, "[job_b] \320\227\320\260\320\277\321\203\321\201\320\272: sleep 1 &&"..., 73) = 73

1363 clone(child_stack=NULL, flags=CLONE_CHILD_CLEARTID| CLONE_CHILD_SETTID|SIGCHLD <unfinished ...>

1375 <... execve resumed>) = 0

1376 set_robust_list(0x7e85fb3fe920, 24 <unfinished ...>

1375 brk(NULL <unfinished ...>

1376 <... set_robust_list resumed>) = 0

1375 <... brk resumed>) = 0x5e0d93f50000

1363 <... clone resumed>, child_tidptr=0x7e85fb3fe910) = 1376

1376 execve("/bin/sh", ["sh", "-c", "sleep 1 && echo \"\320\224\320\266\320\276\320\261 B \320\277\320\276"...], 0x7ffcc001d060 /* 27 vars */ <unfinished ...>

1375 arch_prctl(0x3001 /* ARCH_??? */, 0x7ffd902d4070 <unfinished ...>

1363 wait4(1376, <unfinished ...>

1375 <... arch_prctl resumed>) = -1 EINVAL (Invalid argument)

1376 <... execve resumed>) = 0

1375 mmap(NULL, 8192, PROT_READ|PROT_WRITE, MAP_PRIVATE|MAP_ANONYMOUS, -1, 0 <unfinished ...>

1376 brk(NULL <unfinished ...>

1375 <... mmap resumed>) = 0x7e4b7b260000

1376 <... brk resumed>) = 0x6396f9a35000

1375 access("/etc/ld.so.preload", R_OK <unfinished ...>

1376 arch_prctl(0x3001 /* ARCH_??? */, 0x7fff0a916f80 <unfinished ...>

1375 <... access resumed>) = -1 ENOENT (No such file or directory)

1376 <... arch_prctl resumed>) = -1 EINVAL (Invalid argument)

1375 openat(AT_FDCWD, "/etc/ld.so.cache", O_RDONLY|O_CLOEXEC <unfinished ...>

1376 mmap(NULL, 8192, PROT_READ|PROT_WRITE, MAP_PRIVATE|MAP_ANONYMOUS, -1, 0 <unfinished ...>

1375 <... openat resumed>) = 3

1376 <... mmap resumed>) = 0x7ba7e121a000

1375 newfstatat(3, "", <unfinished ...>

1376 access("/etc/ld.so.preload", R_OK <unfinished ...>

1375 <... newfstatat resumed>{st_mode=S_IFREG|0644, st_size=61360, ...}, AT_EMPTY_PATH) = 0

1376 <... access resumed>) = -1 ENOENT (No such file or directory)

1375 mmap(NULL, 61360, PROT_READ, MAP_PRIVATE, 3, 0 <unfinished ...>

1376 openat(AT_FDCWD, "/etc/ld.so.cache", O_RDONLY|O_CLOEXEC <unfinished ...>

1375 <... mmap resumed>) = 0x7e4b7b251000

1376 <... openat resumed>) = 3

1375 close(3 <unfinished ...>

1376 newfstatat(3, "", {st_mode=S_IFREG|0644, st_size=61360, ...}, AT_EMPTY_PATH) = 0

1375 <... close resumed>) = 0

1376 mmap(NULL, 61360, PROT_READ, MAP_PRIVATE, 3, 0 <unfinished ...>

1375 openat(AT_FDCWD, "/lib/x86_64-linux-gnu/libc.so.6", O_RDONLY|O_CLOEXEC <unfinished ...>

1376 <... mmap resumed>) = 0x7ba7e120b000

1375 <... openat resumed>) = 3

1376 close(3 <unfinished ...>

1375 read(3, <unfinished ...>

1376 <... close resumed>) = 0

1375 <... read resumed>"\177ELF\2\1\1\3\0\0\0\0\0\0\0\0\3\0>\0\1\0\0\0P\237\2\0\0\0\0\0"..., 832) = 832

1376 openat(AT_FDCWD, "/lib/x86_64-linux-gnu/libc.so.6", O_RDONLY|O_CLOEXEC <unfinished ...>

1375 pread64(3, <unfinished ...>

1376 <... openat resumed>) = 3

1375 <... pread64 resumed>"\6\0\0\0\4\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0"..., 784, 64) = 784

1376 read(3, <unfinished ...>

1375 pread64(3, <unfinished ...>

1376 <... read resumed>"\177ELF\2\1\1\3\0\0\0\0\0\0\0\0\3\0>\0\1\0\0\0P\237\2\0\0\0\0"..., 832) = 832

1375 <... pread64 resumed>"\4\0\0\0 \0\0\0\5\0\0\0GNU\0\2\0\0\300\4\0\0\0\3\0\0\0\0\0\0"..., 48, 848) = 48

1376 pread64(3, <unfinished ...>

1375 pread64(3, <unfinished ...>

1376 <... pread64 resumed>"\6\0\0\0\4\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0"..., 784, 64) = 784

1375 <... pread64 resumed>"\4\0\0\0\24\0\0\0\3\0\0\0GNU\0O{\f\225\ \=\201\327\312\301P\32$\230\266\235"..., 68, 896) = 68

1376 pread64(3, <unfinished ...>

1375 newfstatat(3, "", <unfinished ...>

1376 <... pread64 resumed>"\4\0\0\0 \0\0\0\5\0\0\0GNU\0\2\0\0\300\4\0\0\0\3\0\0\0\0\0\0"..., 48, 848) = 48

1375 <... newfstatat resumed>{st_mode=S_IFREG|0755, st_size=2220400, ...}, AT_EMPTY_PATH) = 0

1376 pread64(3, <unfinished ...>

1375 pread64(3, <unfinished ...>

1376 <... pread64 resumed>"\4\0\0\0\24\0\0\0\3\0\0\0GNU\0O{\f\225\ \=\201\327\312\301P\32$\230\266\235"..., 68, 896) = 68

1375 <... pread64 resumed>"\6\0\0\0\4\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0"..., 784, 64) = 784

1376 newfstatat(3, "", <unfinished ...>

1375 mmap(NULL, 2264656, PROT_READ, MAP_PRIVATE|MAP_DENYWRITE, 3, 0 <unfinished ...>

1376 <... newfstatat resumed>{st_mode=S_IFREG|0755, st_size=2220400, ...}, AT_EMPTY_PATH) = 0

1375 <... mmap resumed>) = 0x7e4b7b000000

1376 pread64(3, <unfinished ...>

1375 mprotect(0x7e4b7b028000, 2023424, PROT_NONE <unfinished ...>

1376 <... pread64 resumed>"\6\0\0\0\4\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0"..., 784, 64) = 784

1375 <... mprotect resumed>) = 0

1376 mmap(NULL, 2264656, PROT_READ, MAP_PRIVATE|MAP_DENYWRITE, 3, 0 <unfinished ...>

1375 mmap(0x7e4b7b028000, 1658880, PROT_READ|PROT_EXEC, MAP_PRIVATE|MAP_FIXED|MAP_DENYWRITE, 3, 0x28000 <unfinished ...>

1376 <... mmap resumed>) = 0x7ba7e0e00000

1375 <... mmap resumed>) = 0x7e4b7b028000

1376 mprotect(0x7ba7e0e28000, 2023424, PROT_NONE <unfinished ...>

1375 mmap(0x7e4b7b1bd000, 360448, PROT_READ, MAP_PRIVATE|MAP_FIXED|MAP_DENYWRITE, 3, 0x1bd000 <unfinished ...>

1376 <... mprotect resumed>) = 0

1375 <... mmap resumed>) = 0x7e4b7b1bd000

1376 mmap(0x7ba7e0e28000, 1658880, PROT_READ|PROT_EXEC, MAP_PRIVATE|MAP_FIXED|MAP_DENYWRITE, 3, 0x28000 <unfinished ...>

1375 mmap(0x7e4b7b216000, 24576, PROT_READ|PROT_WRITE, MAP_PRIVATE|MAP_FIXED|MAP_DENYWRITE, 3, 0x215000 <unfinished ...>

1376 <... mmap resumed>) = 0x7ba7e0e28000

1375 <... mmap resumed>) = 0x7e4b7b216000

1376 mmap(0x7ba7e0fbd000, 360448, PROT_READ, MAP_PRIVATE|MAP_FIXED|MAP_DENYWRITE, 3, 0x1bd000 <unfinished ...>

1375 mmap(0x7e4b7b21c000, 52816, PROT_READ|PROT_WRITE, MAP_PRIVATE|MAP_FIXED|MAP_ANONYMOUS, -1, 0 <unfinished ...>

1376 <... mmap resumed>) = 0x7ba7e0fbd000

1375 <... mmap resumed>) = 0x7e4b7b21c000

1376 mmap(0x7ba7e1016000, 24576, PROT_READ|PROT_WRITE, MAP_PRIVATE|MAP_FIXED|MAP_DENYWRITE, 3, 0x215000 <unfinished ...>

1375 close(3 <unfinished ...>

1376 <... mmap resumed>) = 0x7ba7e1016000

1375 <... close resumed>) = 0

1376 mmap(0x7ba7e101c000, 52816, PROT_READ|PROT_WRITE, MAP_PRIVATE|MAP_FIXED|MAP_ANONYMOUS, -1, 0 <unfinished ...>

1375 mmap(NULL, 12288, PROT_READ|PROT_WRITE, MAP_PRIVATE|MAP_ANONYMOUS, -1, 0 <unfinished ...>

1376 <... mmap resumed>) = 0x7ba7e101c000

1375 <... mmap resumed>) = 0x7e4b7b24e000

1376 close(3 <unfinished ...>

1375 arch_prctl(ARCH_SET_FS, 0x7e4b7b24e740 <unfinished ...>

1376 <... close resumed>) = 0

1375 <... arch_prctl resumed>) = 0

1376 mmap(NULL, 12288, PROT_READ|PROT_WRITE, MAP_PRIVATE|MAP_ANONYMOUS, -1, 0 <unfinished ...>

1375 set_tid_address(0x7e4b7b24ea10 <unfinished ...>

1376 <... mmap resumed>) = 0x7ba7e1208000

1375 <... set_tid_address resumed>) = 1375

1376 arch_prctl(ARCH_SET_FS, 0x7ba7e1208740 <unfinished ...>

1375 set_robust_list(0x7e4b7b24ea20, 24 <unfinished ...>

1376 <... arch_prctl resumed>) = 0

1375 <... set_robust_list resumed>) = 0

1376 set_tid_address(0x7ba7e1208a10 <unfinished ...>

1375 rseq(0x7e4b7b24f0e0, 0x20, 0, 0x53053053 <unfinished ...>

1376 <... set_tid_address resumed>) = 1376

1375 <... rseq resumed>) = 0

1376 set_robust_list(0x7ba7e1208a20, 24 <unfinished ...>

1375 mprotect(0x7e4b7b216000, 16384, PROT_READ <unfinished ...>

```
1376  <... set_robust_list resumed>)    = 0
1375  <... mprotect resumed>)           = 0
1376  rseq(0x7ba7e12090e0, 0x20, 0, 0x53053053) = 0
1375  mprotect(0x5e0d5f0d0000, 8192, PROT_READ <unfinished ...>
1376  mprotect(0x7ba7e1016000, 16384, PROT_READ <unfinished ...>
1375  <... mprotect resumed>)           = 0
1376  <... mprotect resumed>)           = 0
1375  mprotect(0x7e4b7b29a000, 8192, PROT_READ <unfinished ...>
1376  mprotect(0x6396d60ac000, 8192, PROT_READ <unfinished ...>
1375  <... mprotect resumed>)           = 0
1376  <... mprotect resumed>)           = 0
1375  prlimit64(0, RLIMIT_STACK, NULL,  <unfinished ...>
1376  mprotect(0x7ba7e1254000, 8192, PROT_READ <unfinished ...>
1375  <... prlimit64 resumed>{rlim_cur=8192*1024,
rlim_max=RLIM64_INFINITY}) = 0
1376  <... mprotect resumed>)           = 0
1375  munmap(0x7e4b7b251000, 61360 <unfinished ...>
1376  prlimit64(0, RLIMIT_STACK, NULL,  <unfinished ...>
1375  <... munmap resumed>)             = 0
1376  <... prlimit64 resumed>{rlim_cur=8192*1024,
rlim_max=RLIM64_INFINITY}) = 0
1375  getuid( <unfinished ...>
1376  munmap(0x7ba7e120b000, 61360 <unfinished ...>
1375  <... getuid resumed>)             = 0
1376  <... munmap resumed>)             = 0
1375  getgid( <unfinished ...>
1376  getuid( <unfinished ...>
1375  <... getgid resumed>)             = 0
```

1376 <... getuid resumed>) = 0

1375 getpid(<unfinished ...>

1376 getgid(<unfinished ...>

1375 <... getpid resumed>) = 1375

1376 <... getgid resumed>) = 0

1375 rt_sigaction(SIGCHLD, {sa_handler=0x5e0d5f0c6aa0, sa_mask=~[RTMIN RT_1], sa_flags=SA_RESTORER, sa_restorer=0x7e4b7b042520}, <unfinished ...>

1376 getpid(<unfinished ...>

1375 <... rt_sigaction resumed>NULL, 8) = 0

1376 <... getpid resumed>) = 1376

1375 geteuid(<unfinished ...>

1376 rt_sigaction(SIGCHLD, {sa_handler=0x6396d60a2aa0, sa_mask=~[RTMIN RT_1], sa_flags=SA_RESTORER, sa_restorer=0x7ba7e0e42520}, <unfinished ...>

1375 <... geteuid resumed>) = 0

1376 <... rt_sigaction resumed>NULL, 8) = 0

1375 getrandom(<unfinished ...>

1376 geteuid(<unfinished ...>

1375 <... getrandom resumed>"\x12\x5b\x49\xc2\xa6\x40\x58\x46", 8, GRND_NONBLOCK) = 8

1376 <... geteuid resumed>) = 0

1375 brk(NULL <unfinished ...>

1376 getrandom(<unfinished ...>

1375 <... brk resumed>) = 0x5e0d93f50000

1376 <... getrandom resumed>"\xa2\x6d\x90\x77\x59\x3f\xf7\x1a", 8, GRND_NONBLOCK) = 8

1375 brk(0x5e0d93f71000 <unfinished ...>

1376 brk(NULL <unfinished ...>

1375 <... brk resumed>) = 0x5e0d93f71000

```
1376  <... brk resumed>)              = 0x6396f9a35000
1375  getppid( <unfinished ...>
1376  brk(0x6396f9a56000 <unfinished ...>
1375  <... getppid resumed>)          = 1361
1376  <... brk resumed>)              = 0x6396f9a56000
1375  newfstatat(AT_FDCWD,
"/mnt/c/Users/\320\237\320\276\320\273\321\214\320\267\320\276\320\262\320\260\321
\202\320\265\320\273\321\214/OneDrive/Desktop/2
\320\272\321\203\321\200\321\201/Laby_OC/\320\232\321\203\321\200\321\201\320\27
6\320\262\320\276\320\271 \320\277\321\200\320\276\320\265\320\272\321\202/src",
<unfinished ...>
1376  getppid()                       = 1361
1375  <... newfstatat resumed>{st_mode=S_IFDIR|0777, st_size=4096, ...}, 0) = 0
1376  newfstatat(AT_FDCWD,
"/mnt/c/Users/\320\237\320\276\320\273\321\214\320\267\320\276\320\262\320\260\321
\202\320\265\320\273\321\214/OneDrive/Desktop/2
\320\272\321\203\321\200\321\201/Laby_OC/\320\232\321\203\321\200\321\201\320\27
6\320\262\320\276\320\271 \320\277\321\200\320\276\320\265\320\272\321\202/src",
<unfinished ...>
1375  newfstatat(AT_FDCWD, ".",  <unfinished ...>
1376  <... newfstatat resumed>{st_mode=S_IFDIR|0777, st_size=4096, ...}, 0) = 0
1375  <... newfstatat resumed>{st_mode=S_IFDIR|0777, st_size=4096, ...}, 0) = 0
1376  newfstatat(AT_FDCWD, ".",  <unfinished ...>
1375  geteuid()                       = 0
1376  <... newfstatat resumed>{st_mode=S_IFDIR|0777, st_size=4096, ...}, 0) = 0
1375  getegid( <unfinished ...>
1376  geteuid( <unfinished ...>
1375  <... getegid resumed>)          = 0
1376  <... geteuid resumed>)          = 0
1375  rt_sigaction(SIGINT, NULL,  <unfinished ...>
```

1376 getegid(<unfinished ...>

1375 <... rt_sigaction resumed>{sa_handler=SIG_DFL, sa_mask=[], sa_flags=0}, 8) = 0

1376 <... getegid resumed>) = 0

1375 rt_sigaction(SIGINT, {sa_handler=0x5e0d5f0c6aa0, sa_mask=~[RTMIN RT_1], sa_flags=SA_RESTORER, sa_restorer=0x7e4b7b042520}, <unfinished ...>

1376 rt_sigaction(SIGINT, NULL, <unfinished ...>

1375 <... rt_sigaction resumed>NULL, 8) = 0

1376 <... rt_sigaction resumed>{sa_handler=SIG_DFL, sa_mask=[], sa_flags=0}, 8) = 0

1375 rt_sigaction(SIGQUIT, NULL, <unfinished ...>

1376 rt_sigaction(SIGINT, {sa_handler=0x6396d60a2aa0, sa_mask=~[RTMIN RT_1], sa_flags=SA_RESTORER, sa_restorer=0x7ba7e0e42520}, <unfinished ...>

1375 <... rt_sigaction resumed>{sa_handler=SIG_DFL, sa_mask=[], sa_flags=0}, 8) = 0

1376 <... rt_sigaction resumed>NULL, 8) = 0

1375 rt_sigaction(SIGQUIT, {sa_handler=SIG_DFL, sa_mask=~[RTMIN RT_1], sa_flags=SA_RESTORER, sa_restorer=0x7e4b7b042520}, <unfinished ...>

1376 rt_sigaction(SIGQUIT, NULL, <unfinished ...>

1375 <... rt_sigaction resumed>NULL, 8) = 0

1376 <... rt_sigaction resumed>{sa_handler=SIG_DFL, sa_mask=[], sa_flags=0}, 8) = 0

1375 rt_sigaction(SIGTERM, NULL, <unfinished ...>

1376 rt_sigaction(SIGQUIT, {sa_handler=SIG_DFL, sa_mask=~[RTMIN RT_1], sa_flags=SA_RESTORER, sa_restorer=0x7ba7e0e42520}, <unfinished ...>

1375 <... rt_sigaction resumed>{sa_handler=SIG_DFL, sa_mask=[], sa_flags=0}, 8) = 0

1376 <... rt_sigaction resumed>NULL, 8) = 0

1375 rt_sigaction(SIGTERM, {sa_handler=SIG_DFL, sa_mask=~[RTMIN RT_1], sa_flags=SA_RESTORER, sa_restorer=0x7e4b7b042520}, <unfinished ...>

1376 rt_sigaction(SIGTERM, NULL, <unfinished ...>

1375 <... rt_sigaction resumed>NULL, 8) = 0

1376 <... rt_sigaction resumed>{sa_handler=SIG_DFL, sa_mask=[], sa_flags=0}, 8) = 0

1375 write(1, "\320\224\320\266\320\276\320\261 C \320\262\321\213\320\277\320\276\320\273\320\275\321\217\320\265\321\202\321\201\321"..., 62 <unfinished ...>

1376 rt_sigaction(SIGTERM, {sa_handler=SIG_DFL, sa_mask=~[RTMIN RT_1], sa_flags=SA_RESTORER, sa_restorer=0x7ba7e0e42520}, <unfinished ...>

1375 <... write resumed>) = 62

1376 <... rt_sigaction resumed>NULL, 8) = 0

1375 exit_group(0 <unfinished ...>

1376 newfstatat(AT_FDCWD, "/usr/local/sbin/sleep", <unfinished ...>

1375 <... exit_group resumed>) = ?

1376 <... newfstatat resumed>0x7fff0a916cf0, 0) = -1 ENOENT (No such file or directory)

1375 +++ exited with 0 +++

1376 newfstatat(AT_FDCWD, "/usr/local/bin/sleep", <unfinished ...>

1365 <... wait4 resumed>[{WIFEXITED(s) && WEXITSTATUS(s) == 0}], 0, NULL) = 1375

1376 <... newfstatat resumed>0x7fff0a916cf0, 0) = -1 ENOENT (No such file or directory)

1365 --- SIGCHLD {si_signo=SIGCHLD, si_code=CLD_EXITED, si_pid=1375, si_uid=0, si_status=0, si_utime=0, si_stime=0} ---

1376 newfstatat(AT_FDCWD, "/usr/sbin/sleep", <unfinished ...>

1365 write(1, "[job_c] \320\243\321\201\320\277\320\265\321\210\320\275\320\276 \320\267\320\260\320\262\320\265\321"..., 40 <unfinished ...>

1376 <... newfstatat resumed>0x7fff0a916cf0, 0) = -1 ENOENT (No such file or directory)

1365 <... write resumed>) = 40

1376 newfstatat(AT_FDCWD, "/usr/bin/sleep", <unfinished ...>

1365 futex(0x63212a6f5a5c, FUTEX_WAIT_BITSET_PRIVATE| FUTEX_CLOCK_REALTIME, 0, NULL, FUTEX_BITSET_MATCH_ANY <unfinished ...>

1376 <... newfstatat resumed>{st_mode=S_IFREG|0755, st_size=35336, ...}, 0) = 0

1376 rt_sigprocmask(SIG_SETMASK, ~[RTMIN RT_1], NULL, 8) = 0

1376 vfork(<unfinished ...>

1377 rt_sigprocmask(SIG_SETMASK, [], ~[KILL STOP RTMIN RT_1], 8) = 0

1377 execve("/usr/bin/sleep", ["sleep", "1"], 0x6396f9a35a48 /* 27 vars */ <unfinished ...>

1376 <... vfork resumed>) = 1377

1376 rt_sigprocmask(SIG_SETMASK, [], <unfinished ...>

1377 <... execve resumed>) = 0

1376 <... rt_sigprocmask resumed>~[KILL STOP RTMIN RT_1], 8) = 0

1377 brk(NULL <unfinished ...>

1376 wait4(-1, <unfinished ...>

1377 <... brk resumed>) = 0x5a808c0d8000

1377 arch_prctl(0x3001 /* ARCH_??? */, 0x7fff5cd595d0) = -1 EINVAL (Invalid argument)

1377 mmap(NULL, 8192, PROT_READ|PROT_WRITE, MAP_PRIVATE| MAP_ANONYMOUS, -1, 0) = 0x76ee0caaf000

1377 access("/etc/ld.so.preload", R_OK) = -1 ENOENT (No such file or directory)

1377 openat(AT_FDCWD, "/etc/ld.so.cache", O_RDONLY|O_CLOEXEC) = 3

1377 newfstatat(3, "", {st_mode=S_IFREG|0644, st_size=61360, ...}, AT_EMPTY_PATH) = 0

1377 mmap(NULL, 61360, PROT_READ, MAP_PRIVATE, 3, 0) = 0x76ee0caa0000

1377 close(3) = 0

1377 openat(AT_FDCWD, "/lib/x86_64-linux-gnu/libc.so.6", O_RDONLY| O_CLOEXEC) = 3

1377 read(3, "\177ELF\2\1\1\3\0\0\0\0\0\0\0\0\3\0>\0\1\0\0\0P\237\2\0\0\0\0\0"..., 832) = 832

1377 pread64(3, "\6\0\0\0\4\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0"..., 784, 64) = 784

1377 pread64(3, "\4\0\0\0 \0\0\0\5\0\0\0GNU\0\2\0\0\0300\4\0\0\0\3\0\0\0\0\0\0\0"..., 48, 848) = 48

1377 pread64(3, "\4\0\0\0\24\0\0\0\3\0\0\0GNU\0O{\f\225\ \=\201\327\312\301P\32$\230\266\235"..., 68, 896) = 68

1377 newfstatat(3, "", {st_mode=S_IFREG|0755, st_size=2220400, ...}, AT_EMPTY_PATH) = 0

1377 pread64(3, "\6\0\0\0\4\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0"..., 784, 64) = 784

1377 mmap(NULL, 2264656, PROT_READ, MAP_PRIVATE|MAP_DENYWRITE, 3, 0) = 0x76ee0c800000

1377 mprotect(0x76ee0c828000, 2023424, PROT_NONE) = 0

1377 mmap(0x76ee0c828000, 1658880, PROT_READ|PROT_EXEC, MAP_PRIVATE|MAP_FIXED|MAP_DENYWRITE, 3, 0x28000) = 0x76ee0c828000

1377 mmap(0x76ee0c9bd000, 360448, PROT_READ, MAP_PRIVATE|MAP_FIXED|MAP_DENYWRITE, 3, 0x1bd000) = 0x76ee0c9bd000

1377 mmap(0x76ee0ca16000, 24576, PROT_READ|PROT_WRITE, MAP_PRIVATE|MAP_FIXED|MAP_DENYWRITE, 3, 0x215000) = 0x76ee0ca16000

1377 mmap(0x76ee0ca1c000, 52816, PROT_READ|PROT_WRITE, MAP_PRIVATE|MAP_FIXED|MAP_ANONYMOUS, -1, 0) = 0x76ee0ca1c000

1377 close(3) = 0

1377 mmap(NULL, 12288, PROT_READ|PROT_WRITE, MAP_PRIVATE|MAP_ANONYMOUS, -1, 0) = 0x76ee0ca9d000

1377 arch_prctl(ARCH_SET_FS, 0x76ee0ca9d740) = 0

1377 set_tid_address(0x76ee0ca9da10) = 1377

1377 set_robust_list(0x76ee0ca9da20, 24) = 0

1377 rseq(0x76ee0ca9e0e0, 0x20, 0, 0x53053053) = 0

1377 mprotect(0x76ee0ca16000, 16384, PROT_READ) = 0

1377 mprotect(0x5a805731d000, 4096, PROT_READ) = 0

1377 mprotect(0x76ee0cae9000, 8192, PROT_READ) = 0

1377 prlimit64(0, RLIMIT_STACK, NULL, {rlim_cur=8192*1024, rlim_max=RLIM64_INFINITY}) = 0

1377 munmap(0x76ee0caa0000, 61360) = 0

1377 getrandom("\xf6\x9e\x39\xc4\x84\x93\x42\x6d", 8, GRND_NONBLOCK) = 8

1377 brk(NULL) = 0x5a808c0d8000

1377 brk(0x5a808c0f9000) = 0x5a808c0f9000

1377 openat(AT_FDCWD, "/usr/lib/locale/locale-archive", O_RDONLY|O_CLOEXEC) = -1 ENOENT (No such file or directory)

1377 openat(AT_FDCWD, "/usr/share/locale/locale.alias", O_RDONLY|O_CLOEXEC) = 3

1377 newfstatat(3, "", {st_mode=S_IFREG|0644, st_size=2996, ...}, AT_EMPTY_PATH) = 0

1377 read(3, "# Locale name alias data base.\n#"..., 4096) = 2996

1377 read(3, "", 4096) = 0

1377 close(3) = 0

1377 openat(AT_FDCWD, "/usr/lib/locale/C.UTF-8/LC_IDENTIFICATION", O_RDONLY|O_CLOEXEC) = -1 ENOENT (No such file or directory)

1377 openat(AT_FDCWD, "/usr/lib/locale/C.utf8/LC_IDENTIFICATION", O_RDONLY|O_CLOEXEC) = 3

1377 newfstatat(3, "", {st_mode=S_IFREG|0644, st_size=258, ...}, AT_EMPTY_PATH) = 0

1377 mmap(NULL, 258, PROT_READ, MAP_PRIVATE, 3, 0) = 0x76ee0cae8000

1377 close(3) = 0

1377 openat(AT_FDCWD, "/usr/lib/x86_64-linux-gnu/gconv/gconv-modules.cache", O_RDONLY) = 3

1377 newfstatat(3, "", {st_mode=S_IFREG|0644, st_size=27002, ...}, AT_EMPTY_PATH) = 0

1377 mmap(NULL, 27002, PROT_READ, MAP_SHARED, 3, 0) = 0x76ee0caa8000

1377 close(3) = 0

1377 futex(0x76ee0ca1ba6c, FUTEX_WAKE_PRIVATE, 2147483647) = 0

1377 openat(AT_FDCWD, "/usr/lib/locale/C.UTF-8/LC_MEASUREMENT", O_RDONLY|O_CLOEXEC) = -1 ENOENT (No such file or directory)

1377 openat(AT_FDCWD, "/usr/lib/locale/C.utf8/LC_MEASUREMENT", O_RDONLY|O_CLOEXEC) = 3

1377 newfstatat(3, "", {st_mode=S_IFREG|0644, st_size=23, ...}, AT_EMPTY_PATH) = 0

1377 mmap(NULL, 23, PROT_READ, MAP_PRIVATE, 3, 0) = 0x76ee0caa7000

1377 close(3) = 0

1377 openat(AT_FDCWD, "/usr/lib/locale/C.UTF-8/LC_TELEPHONE", O_RDONLY|O_CLOEXEC) = -1 ENOENT (No such file or directory)

1377 openat(AT_FDCWD, "/usr/lib/locale/C.utf8/LC_TELEPHONE", O_RDONLY|O_CLOEXEC) = 3

1377 newfstatat(3, "", {st_mode=S_IFREG|0644, st_size=47, ...}, AT_EMPTY_PATH) = 0

1377 mmap(NULL, 47, PROT_READ, MAP_PRIVATE, 3, 0) = 0x76ee0caa6000

1377 close(3) = 0

1377 openat(AT_FDCWD, "/usr/lib/locale/C.UTF-8/LC_ADDRESS", O_RDONLY|O_CLOEXEC) = -1 ENOENT (No such file or directory)

1377 openat(AT_FDCWD, "/usr/lib/locale/C.utf8/LC_ADDRESS", O_RDONLY|O_CLOEXEC) = 3

1377 newfstatat(3, "", {st_mode=S_IFREG|0644, st_size=127, ...}, AT_EMPTY_PATH) = 0

1377 mmap(NULL, 127, PROT_READ, MAP_PRIVATE, 3, 0) = 0x76ee0caa5000

1377 close(3) = 0

1377 openat(AT_FDCWD, "/usr/lib/locale/C.UTF-8/LC_NAME", O_RDONLY|O_CLOEXEC) = -1 ENOENT (No such file or directory)

1377 openat(AT_FDCWD, "/usr/lib/locale/C.utf8/LC_NAME", O_RDONLY|O_CLOEXEC) = 3

1377 newfstatat(3, "", {st_mode=S_IFREG|0644, st_size=62, ...}, AT_EMPTY_PATH) = 0

1377 mmap(NULL, 62, PROT_READ, MAP_PRIVATE, 3, 0) = 0x76ee0caa4000

1377 close(3) = 0

1377 openat(AT_FDCWD, "/usr/lib/locale/C.UTF-8/LC_PAPER", O_RDONLY|O_CLOEXEC) = -1 ENOENT (No such file or directory)

1377 openat(AT_FDCWD, "/usr/lib/locale/C.utf8/LC_PAPER", O_RDONLY|O_CLOEXEC) = 3

1377 newfstatat(3, "", {st_mode=S_IFREG|0644, st_size=34, ...}, AT_EMPTY_PATH) = 0

1377 mmap(NULL, 34, PROT_READ, MAP_PRIVATE, 3, 0) = 0x76ee0caa3000

1377 close(3) = 0

1377 openat(AT_FDCWD, "/usr/lib/locale/C.UTF-8/LC_MESSAGES", O_RDONLY|O_CLOEXEC) = -1 ENOENT (No such file or directory)

1377 openat(AT_FDCWD, "/usr/lib/locale/C.utf8/LC_MESSAGES", O_RDONLY|O_CLOEXEC) = 3

1377 newfstatat(3, "", {st_mode=S_IFDIR|0755, st_size=4096, ...}, AT_EMPTY_PATH) = 0

1377 close(3) = 0

1377 openat(AT_FDCWD, "/usr/lib/locale/C.utf8/LC_MESSAGES/SYS_LC_MESSAGES", O_RDONLY|O_CLOEXEC) = 3

1377 newfstatat(3, "", {st_mode=S_IFREG|0644, st_size=48, ...}, AT_EMPTY_PATH) = 0

1377 mmap(NULL, 48, PROT_READ, MAP_PRIVATE, 3, 0) = 0x76ee0caa2000

1377 close(3) = 0

1377 openat(AT_FDCWD, "/usr/lib/locale/C.UTF-8/LC_MONETARY", O_RDONLY|O_CLOEXEC) = -1 ENOENT (No such file or directory)

1377 openat(AT_FDCWD, "/usr/lib/locale/C.utf8/LC_MONETARY", O_RDONLY|O_CLOEXEC) = 3

1377 newfstatat(3, "", {st_mode=S_IFREG|0644, st_size=270, ...}, AT_EMPTY_PATH) = 0

1377 mmap(NULL, 270, PROT_READ, MAP_PRIVATE, 3, 0) = 0x76ee0caa1000

1377 close(3) = 0

1377 openat(AT_FDCWD, "/usr/lib/locale/C.UTF-8/LC_COLLATE", O_RDONLY|O_CLOEXEC) = -1 ENOENT (No such file or directory)

1377 openat(AT_FDCWD, "/usr/lib/locale/C.utf8/LC_COLLATE", O_RDONLY|O_CLOEXEC) = 3

1377 newfstatat(3, "", {st_mode=S_IFREG|0644, st_size=1406, ...}, AT_EMPTY_PATH) = 0

1377 mmap(NULL, 1406, PROT_READ, MAP_PRIVATE, 3, 0) = 0x76ee0caa0000

1377 close(3) = 0

1377 openat(AT_FDCWD, "/usr/lib/locale/C.UTF-8/LC_TIME", O_RDONLY|O_CLOEXEC) = -1 ENOENT (No such file or directory)

1377 openat(AT_FDCWD, "/usr/lib/locale/C.utf8/LC_TIME", O_RDONLY|O_CLOEXEC) = 3

1377 newfstatat(3, "", {st_mode=S_IFREG|0644, st_size=3360, ...}, AT_EMPTY_PATH) = 0

1377 mmap(NULL, 3360, PROT_READ, MAP_PRIVATE, 3, 0) = 0x76ee0ca9c000

1377 close(3) = 0

1377 openat(AT_FDCWD, "/usr/lib/locale/C.UTF-8/LC_NUMERIC", O_RDONLY|O_CLOEXEC) = -1 ENOENT (No such file or directory)

1377 openat(AT_FDCWD, "/usr/lib/locale/C.utf8/LC_NUMERIC", O_RDONLY|O_CLOEXEC) = 3

1377 newfstatat(3, "", {st_mode=S_IFREG|0644, st_size=50, ...}, AT_EMPTY_PATH) = 0

1377 mmap(NULL, 50, PROT_READ, MAP_PRIVATE, 3, 0) = 0x76ee0ca9b000

1377 close(3) = 0

1377 openat(AT_FDCWD, "/usr/lib/locale/C.UTF-8/LC_CTYPE", O_RDONLY|O_CLOEXEC) = -1 ENOENT (No such file or directory)

1377 openat(AT_FDCWD, "/usr/lib/locale/C.utf8/LC_CTYPE", O_RDONLY|O_CLOEXEC) = 3

1377 newfstatat(3, "", {st_mode=S_IFREG|0644, st_size=353616, ...}, AT_EMPTY_PATH) = 0

1377 mmap(NULL, 353616, PROT_READ, MAP_PRIVATE, 3, 0) = 0x76ee0ca44000

1377 close(3) = 0

1377 clock_nanosleep(CLOCK_REALTIME, 0, {tv_sec=1, tv_nsec=0}, 0x7fff5cd59620) = 0

1377 close(1) = 0

1377 close(2) = 0

1377 exit_group(0) = ?

1377 +++ exited with 0 +++

1376 <... wait4 resumed>[{WIFEXITED(s) && WEXITSTATUS(s) == 0}], 0, NULL) = 1377

1376 --- SIGCHLD {si_signo=SIGCHLD, si_code=CLD_EXITED, si_pid=1377, si_uid=0, si_status=0, si_utime=0, si_stime=0} ---

1376 rt_sigreturn({mask=[]}) = 1377

1376 wait4(-1, 0x7fff0a916c4c, WNOHANG, NULL) = -1 ECHILD (No child processes)

1376 write(1, "\320\224\320\266\320\276\320\261 B \320\277\320\276\321\201\320\273\320\265 \320\277\320\260\321\203\320\267\321\213"..., 33) = 33

1376 exit_group(0) = ?

1376 +++ exited with 0 +++

1363 <... wait4 resumed>[{WIFEXITED(s) && WEXITSTATUS(s) == 0}], 0, NULL) = 1376

1363 --- SIGCHLD {si_signo=SIGCHLD, si_code=CLD_EXITED, si_pid=1376, si_uid=0, si_status=0, si_utime=0, si_stime=0} ---

1363 write(1, "[job_b] \320\243\321\201\320\277\320\265\321\210\320\275\320\276 \320\267\320\260\320\262\320\265\321"..., 40) = 40

1363 futex(0x63212a6f5a58, FUTEX_WAKE_PRIVATE, 1 <unfinished ...>

1366 <... futex resumed>) = 0

1363 <... futex resumed>) = 1

1366 futex(0x63212a6f5a08, FUTEX_WAKE_PRIVATE, 1 <unfinished ...>

1363 futex(0x63212a6f5a5c, FUTEX_WAIT_BITSET_PRIVATE|FUTEX_CLOCK_REALTIME, 0, NULL, FUTEX_BITSET_MATCH_ANY <unfinished ...>

1366 <... futex resumed>) = 0

1366 write(1, "[job_d] \320\227\320\260\320\277\321\203\321\201\320\272: /bin/false"..., 33) = 33

1366 clone(child_stack=NULL, flags=CLONE_CHILD_CLEARTID|CLONE_CHILD_SETTID|SIGCHLD, child_tidptr=0x7e85fa3fc910) = 1378

1378 set_robust_list(0x7e85fa3fc920, 24 <unfinished ...>

1366 wait4(1378, <unfinished ...>

1378 <... set_robust_list resumed>) = 0

1378 execve("/bin/sh", ["sh", "-c", "/bin/false"], 0x7ffcc001d060 /* 27 vars */) = 0

1378 brk(NULL) = 0x5c8c645d1000

1378 arch_prctl(0x3001 /* ARCH_??? */, 0x7ffc9ca456a0) = -1 EINVAL (Invalid argument)

1378 mmap(NULL, 8192, PROT_READ|PROT_WRITE, MAP_PRIVATE|MAP_ANONYMOUS, -1, 0) = 0x7179a9ae3000

1378 access("/etc/ld.so.preload", R_OK) = -1 ENOENT (No such file or directory)

1378 openat(AT_FDCWD, "/etc/ld.so.cache", O_RDONLY|O_CLOEXEC) = 3

1378 newfstatat(3, "", {st_mode=S_IFREG|0644, st_size=61360, ...}, AT_EMPTY_PATH) = 0

1378 mmap(NULL, 61360, PROT_READ, MAP_PRIVATE, 3, 0) = 0x7179a9ad4000

```
1378  close(3)                          = 0

1378  openat(AT_FDCWD, "/lib/x86_64-linux-gnu/libc.so.6", O_RDONLY|
O_CLOEXEC) = 3

1378  read(3, "\177ELF\2\1\1\3\0\0\0\0\0\0\0\0\3\0>\0\1\0\0\0P\237\2\0\0\0\0\0"...,
832) = 832

1378  pread64(3,
"\6\0\0\0\4\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0"..., 784, 64) = 784

1378  pread64(3, "\4\0\0\0 \0\0\0\5\0\0\0GNU\0\2\0\0\0300\4\0\0\0\3\0\0\0\0\0\0\0"...,
48, 848) = 48

1378  pread64(3, "\4\0\0\0\24\0\0\0\3\0\0\0GNU\0O{\f\225\
\=\201\327\312\301P\32$\230\266\235"..., 68, 896) = 68

1378  newfstatat(3, "", {st_mode=S_IFREG|0755, st_size=2220400, ...},
AT_EMPTY_PATH) = 0

1378  pread64(3,
"\6\0\0\0\4\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0"..., 784, 64) = 784

1378  mmap(NULL, 2264656, PROT_READ, MAP_PRIVATE|
MAP_DENYWRITE, 3, 0) = 0x7179a9800000

1378  mprotect(0x7179a9828000, 2023424, PROT_NONE) = 0

1378  mmap(0x7179a9828000, 1658880, PROT_READ|PROT_EXEC,
MAP_PRIVATE|MAP_FIXED|MAP_DENYWRITE, 3, 0x28000) = 0x7179a9828000

1378  mmap(0x7179a99bd000, 360448, PROT_READ, MAP_PRIVATE|
MAP_FIXED|MAP_DENYWRITE, 3, 0x1bd000) = 0x7179a99bd000

1378  mmap(0x7179a9a16000, 24576, PROT_READ|PROT_WRITE,
MAP_PRIVATE|MAP_FIXED|MAP_DENYWRITE, 3, 0x215000) = 0x7179a9a16000

1378  mmap(0x7179a9a1c000, 52816, PROT_READ|PROT_WRITE,
MAP_PRIVATE|MAP_FIXED|MAP_ANONYMOUS, -1, 0) = 0x7179a9a1c000

1378  close(3)                          = 0

1378  mmap(NULL, 12288, PROT_READ|PROT_WRITE, MAP_PRIVATE|
MAP_ANONYMOUS, -1, 0) = 0x7179a9ad1000

1378  arch_prctl(ARCH_SET_FS, 0x7179a9ad1740) = 0

1378  set_tid_address(0x7179a9ad1a10)   = 1378

1378  set_robust_list(0x7179a9ad1a20, 24) = 0
```

1378 rseq(0x7179a9ad20e0, 0x20, 0, 0x53053053) = 0

1378 mprotect(0x7179a9a16000, 16384, PROT_READ) = 0

1378 mprotect(0x5c8c39f37000, 8192, PROT_READ) = 0

1378 mprotect(0x7179a9b1d000, 8192, PROT_READ) = 0

1378 prlimit64(0, RLIMIT_STACK, NULL, {rlim_cur=8192*1024, rlim_max=RLIM64_INFINITY}) = 0

1378 munmap(0x7179a9ad4000, 61360) = 0

1378 getuid() = 0

1378 getgid() = 0

1378 getpid() = 1378

1378 rt_sigaction(SIGCHLD, {sa_handler=0x5c8c39f2daa0, sa_mask=~[RTMIN RT_1], sa_flags=SA_RESTORER, sa_restorer=0x7179a9842520}, NULL, 8) = 0

1378 geteuid() = 0

1378 getrandom("\xbc\xab\xf2\x7e\xce\x46\x1b\x1a", 8, GRND_NONBLOCK) = 8

1378 brk(NULL) = 0x5c8c645d1000

1378 brk(0x5c8c645f2000) = 0x5c8c645f2000

1378 getppid() = 1361

1378 newfstatat(AT_FDCWD, "/mnt/c/Users/\320\237\320\276\320\273\321\214\320\267\320\276\320\262\320\260\321\202\320\265\320\273\321\214/OneDrive/Desktop/2\320\272\321\203\321\200\321\201/Laby_OC/\320\232\321\203\321\200\321\201\320\276\320\262\320\276\320\271 \320\277\321\200\320\276\320\265\320\272\321\202/src", {st_mode=S_IFDIR|0777, st_size=4096, ...}, 0) = 0

1378 newfstatat(AT_FDCWD, ".", {st_mode=S_IFDIR|0777, st_size=4096, ...}, 0) = 0

1378 geteuid() = 0

1378 getegid() = 0

1378 rt_sigaction(SIGINT, NULL, {sa_handler=SIG_DFL, sa_mask=[], sa_flags=0}, 8) = 0

1378 rt_sigaction(SIGINT, {sa_handler=0x5c8c39f2daa0, sa_mask=~[RTMIN RT_1], sa_flags=SA_RESTORER, sa_restorer=0x7179a9842520}, NULL, 8) = 0

1378 rt_sigaction(SIGQUIT, NULL, {sa_handler=SIG_DFL, sa_mask=[], sa_flags=0}, 8) = 0

1378 rt_sigaction(SIGQUIT, {sa_handler=SIG_DFL, sa_mask=~[RTMIN RT_1], sa_flags=SA_RESTORER, sa_restorer=0x7179a9842520}, NULL, 8) = 0

1378 rt_sigaction(SIGTERM, NULL, {sa_handler=SIG_DFL, sa_mask=[], sa_flags=0}, 8) = 0

1378 rt_sigaction(SIGTERM, {sa_handler=SIG_DFL, sa_mask=~[RTMIN RT_1], sa_flags=SA_RESTORER, sa_restorer=0x7179a9842520}, NULL, 8) = 0

1378 rt_sigprocmask(SIG_SETMASK, ~[RTMIN RT_1], NULL, 8) = 0

1378 vfork(<unfinished ...>

1379 rt_sigprocmask(SIG_SETMASK, [], ~[KILL STOP RTMIN RT_1], 8) = 0

1379 execve("/bin/false", ["/bin/false"], 0x5c8c39f39700 /* 27 vars */ <unfinished ...>

1378 <... vfork resumed>) = 1379

1378 rt_sigprocmask(SIG_SETMASK, [], <unfinished ...>

1379 <... execve resumed>) = 0

1378 <... rt_sigprocmask resumed>~[KILL STOP RTMIN RT_1], 8) = 0

1379 brk(NULL <unfinished ...>

1378 wait4(-1, <unfinished ...>

1379 <... brk resumed>) = 0x5be976f8b000

1379 arch_prctl(0x3001 /* ARCH_??? */, 0x7fffd8b20790) = -1 EINVAL (Invalid argument)

1379 mmap(NULL, 8192, PROT_READ|PROT_WRITE, MAP_PRIVATE|MAP_ANONYMOUS, -1, 0) = 0x7b8d2bc65000

1379 access("/etc/ld.so.preload", R_OK) = -1 ENOENT (No such file or directory)

1379 openat(AT_FDCWD, "/etc/ld.so.cache", O_RDONLY|O_CLOEXEC) = 3

1379 newfstatat(3, "", {st_mode=S_IFREG|0644, st_size=61360, ...}, AT_EMPTY_PATH) = 0

1379 mmap(NULL, 61360, PROT_READ, MAP_PRIVATE, 3, 0) = 0x7b8d2bc56000

1379 close(3) = 0

1379 openat(AT_FDCWD, "/lib/x86_64-linux-gnu/libc.so.6", O_RDONLY|O_CLOEXEC) = 3

1379 read(3, "\177ELF\2\1\1\3\0\0\0\0\0\0\0\0\3\0>\0\1\0\0\0P\237\2\0\0\0\0\0"..., 832) = 832

1379 pread64(3, "\6\0\0\0\4\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0"..., 784, 64) = 784

1379 pread64(3, "\4\0\0\0 \0\0\0\5\0\0\0GNU\0\2\0\0\300\4\0\0\0\3\0\0\0\0\0\0\0"..., 48, 848) = 48

1379 pread64(3, "\4\0\0\0\24\0\0\0\3\0\0\0GNU\0O{\f\225\ \=\201\327\312\301P\32$\230\266\235"..., 68, 896) = 68

1379 newfstatat(3, "", {st_mode=S_IFREG|0755, st_size=2220400, ...}, AT_EMPTY_PATH) = 0

1379 pread64(3, "\6\0\0\0\4\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0@\0\0\0\0\0\0\0"..., 784, 64) = 784

1379 mmap(NULL, 2264656, PROT_READ, MAP_PRIVATE|MAP_DENYWRITE, 3, 0) = 0x7b8d2ba00000

1379 mprotect(0x7b8d2ba28000, 2023424, PROT_NONE) = 0

1379 mmap(0x7b8d2ba28000, 1658880, PROT_READ|PROT_EXEC, MAP_PRIVATE|MAP_FIXED|MAP_DENYWRITE, 3, 0x28000) = 0x7b8d2ba28000

1379 mmap(0x7b8d2bbbd000, 360448, PROT_READ, MAP_PRIVATE|MAP_FIXED|MAP_DENYWRITE, 3, 0x1bd000) = 0x7b8d2bbbd000

1379 mmap(0x7b8d2bc16000, 24576, PROT_READ|PROT_WRITE, MAP_PRIVATE|MAP_FIXED|MAP_DENYWRITE, 3, 0x215000) = 0x7b8d2bc16000

1379 mmap(0x7b8d2bc1c000, 52816, PROT_READ|PROT_WRITE, MAP_PRIVATE|MAP_FIXED|MAP_ANONYMOUS, -1, 0) = 0x7b8d2bc1c000

1379 close(3) = 0

1379 mmap(NULL, 12288, PROT_READ|PROT_WRITE, MAP_PRIVATE|MAP_ANONYMOUS, -1, 0) = 0x7b8d2bc53000

1379 arch_prctl(ARCH_SET_FS, 0x7b8d2bc53740) = 0

1379 set_tid_address(0x7b8d2bc53a10) = 1379

1379 set_robust_list(0x7b8d2bc53a20, 24) = 0

1379 rseq(0x7b8d2bc540e0, 0x20, 0, 0x53053053) = 0

1379 mprotect(0x7b8d2bc16000, 16384, PROT_READ) = 0

1379 mprotect(0x5be96b58d000, 4096, PROT_READ) = 0

1379 mprotect(0x7b8d2bc9f000, 8192, PROT_READ) = 0

1379 prlimit64(0, RLIMIT_STACK, NULL, {rlim_cur=8192*1024, rlim_max=RLIM64_INFINITY}) = 0

1379 munmap(0x7b8d2bc56000, 61360) = 0

1379 exit_group(1) = ?

1379 +++ exited with 1 +++

1378 <... wait4 resumed>[{WIFEXITED(s) && WEXITSTATUS(s) == 1}], 0, NULL) = 1379

1378 --- SIGCHLD {si_signo=SIGCHLD, si_code=CLD_EXITED, si_pid=1379, si_uid=0, si_status=1, si_utime=0, si_stime=0} ---

1378 rt_sigreturn({mask=[]}) = 1379

1378 wait4(-1, 0x7ffc9ca453cc, WNOHANG, NULL) = -1 ECHILD (No child processes)

1378 exit_group(1) = ?

1378 +++ exited with 1 +++

1366 <... wait4 resumed>[{WIFEXITED(s) && WEXITSTATUS(s) == 1}], 0, NULL) = 1378

1366 --- SIGCHLD {si_signo=SIGCHLD, si_code=CLD_EXITED, si_pid=1378, si_uid=0, si_status=1, si_utime=0, si_stime=0} ---

1366 write(1, "[job_d] \320\227\320\260\320\262\320\265\321\200\321\210\320\265\320\275 \321\201 \320\276\321\210"..., 55) = 55

1366 futex(0x63212a6f5a58, FUTEX_WAKE_PRIVATE, 2147483647 <unfinished ...>

1369 <... futex resumed>) = 0

```
1370  <... futex resumed>)              = 0
1368  <... futex resumed>)              = 0
1367  <... futex resumed>)              = 0
1374  <... futex resumed>)              = 0
1373  <... futex resumed>)              = 0
1372  <... futex resumed>)              = 0
1371  <... futex resumed>)              = 0
1370  futex(0x63212a6f5a08, FUTEX_WAIT_PRIVATE, 2, NULL <unfinished ...>
1369  futex(0x63212a6f5a08, FUTEX_WAIT_PRIVATE, 2, NULL <unfinished ...>
1368  futex(0x63212a6f5a08, FUTEX_WAIT_PRIVATE, 2, NULL <unfinished ...>
1366  <... futex resumed>)              = 8
1374  futex(0x63212a6f5a08, FUTEX_WAIT_PRIVATE, 2, NULL <unfinished ...>
1373  futex(0x63212a6f5a08, FUTEX_WAIT_PRIVATE, 2, NULL <unfinished ...>
1372  futex(0x63212a6f5a08, FUTEX_WAIT_PRIVATE, 2, NULL <unfinished ...>
1371  futex(0x63212a6f5a08, FUTEX_WAIT_PRIVATE, 2, NULL <unfinished ...>
1367  futex(0x63212a6f5a08, FUTEX_WAIT_PRIVATE, 2, NULL <unfinished ...>
1366  futex(0x63212a6f5a5c, FUTEX_WAKE_PRIVATE, 2147483647) = 3
1365  <... futex resumed>)              = 0
1362  <... futex resumed>)              = 0
1366  futex(0x63212a6f5a08, FUTEX_WAKE_PRIVATE, 1 <unfinished ...>
1365  futex(0x63212a6f5a08, FUTEX_WAKE_PRIVATE, 1 <unfinished ...>
1363  <... futex resumed>)              = 0
1370  <... futex resumed>)              = 0
1369  <... futex resumed>)              = 0
1366  <... futex resumed>)              = 1
1365  <... futex resumed>)              = 1
1362  futex(0x63212a6f5a08, FUTEX_WAKE_PRIVATE, 1 <unfinished ...>
```

```
1370  futex(0x63212a6f5a08, FUTEX_WAKE_PRIVATE, 1 <unfinished ...>
1369  futex(0x63212a6f5a08, FUTEX_WAKE_PRIVATE, 1 <unfinished ...>
1366  rt_sigprocmask(SIG_BLOCK, ~[RT_1],  <unfinished ...>
1365  rt_sigprocmask(SIG_BLOCK, ~[RT_1],  <unfinished ...>
1363  futex(0x63212a6f5a08, FUTEX_WAKE_PRIVATE, 1 <unfinished ...>
1374  <... futex resumed>)              = 0
1373  <... futex resumed>)              = 0
1370  <... futex resumed>)              = 1
1369  <... futex resumed>)              = 1
1368  <... futex resumed>)              = 0
1366  <... rt_sigprocmask resumed>NULL, 8) = 0
1365  <... rt_sigprocmask resumed>NULL, 8) = 0
1362  <... futex resumed>)              = 1
1374  futex(0x63212a6f5a08, FUTEX_WAKE_PRIVATE, 1 <unfinished ...>
1373  futex(0x63212a6f5a08, FUTEX_WAKE_PRIVATE, 1 <unfinished ...>
1372  <... futex resumed>)              = 0
1370  rt_sigprocmask(SIG_BLOCK, ~[RT_1],  <unfinished ...>
1369  rt_sigprocmask(SIG_BLOCK, ~[RT_1],  <unfinished ...>
1368  futex(0x63212a6f5a08, FUTEX_WAKE_PRIVATE, 1 <unfinished ...>
1366  madvise(0x7e85f9bfc000, 8368128, MADV_DONTNEED <unfinished ...>
1365  madvise(0x7e85fa3fd000, 8368128, MADV_DONTNEED <unfinished ...>
1363  <... futex resumed>)              = 1
1374  <... futex resumed>)              = 1
1373  <... futex resumed>)              = 1
1372  futex(0x63212a6f5a08, FUTEX_WAKE_PRIVATE, 1 <unfinished ...>
1371  <... futex resumed>)              = 0
1370  <... rt_sigprocmask resumed>NULL, 8) = 0
```

```
1369  <... rt_sigprocmask resumed>NULL, 8) = 0
1368  <... futex resumed>)              = 0
1367  <... futex resumed>)              = 0
1366  <... madvise resumed>)            = 0
1365  <... madvise resumed>)            = 0
1362  rt_sigprocmask(SIG_BLOCK, ~[RT_1],  <unfinished ...>
1374  rt_sigprocmask(SIG_BLOCK, ~[RT_1],  <unfinished ...>
1373  rt_sigprocmask(SIG_BLOCK, ~[RT_1],  <unfinished ...>
1372  <... futex resumed>)              = 0
1371  futex(0x63212a6f5a08, FUTEX_WAKE_PRIVATE, 1 <unfinished ...>
1370  madvise(0x7e85f7bf8000, 8368128, MADV_DONTNEED <unfinished ...>
1369  madvise(0x7e85f83f9000, 8368128, MADV_DONTNEED <unfinished ...>
1368  rt_sigprocmask(SIG_BLOCK, ~[RT_1],  <unfinished ...>
1367  futex(0x63212a6f5a08, FUTEX_WAKE_PRIVATE, 1 <unfinished ...>
1366  exit(0 <unfinished ...>
1365  exit(0 <unfinished ...>
1363  rt_sigprocmask(SIG_BLOCK, ~[RT_1],  <unfinished ...>
1374  <... rt_sigprocmask resumed>NULL, 8) = 0
1373  <... rt_sigprocmask resumed>NULL, 8) = 0
1372  rt_sigprocmask(SIG_BLOCK, ~[RT_1],  <unfinished ...>
1371  <... futex resumed>)              = 0
1370  <... madvise resumed>)            = 0
1369  <... madvise resumed>)            = 0
1368  <... rt_sigprocmask resumed>NULL, 8) = 0
1367  <... futex resumed>)              = 0
1366  <... exit resumed>)               = ?
1365  <... exit resumed>)               = ?
```

```
1362  <... rt_sigprocmask resumed>NULL, 8) = 0
1374  madvise(0x7e85f5bf4000, 8368128, MADV_DONTNEED <unfinished ...>
1373  madvise(0x7e85f63f5000, 8368128, MADV_DONTNEED <unfinished ...>
1372  <... rt_sigprocmask resumed>NULL, 8) = 0
1371  rt_sigprocmask(SIG_BLOCK, ~[RT_1],  <unfinished ...>
1370  exit(0 <unfinished ...>
1369  exit(0 <unfinished ...>
1368  madvise(0x7e85f8bfa000, 8368128, MADV_DONTNEED <unfinished ...>
1367  rt_sigprocmask(SIG_BLOCK, ~[RT_1],  <unfinished ...>
1366  +++ exited with 0 +++
1365  +++ exited with 0 +++
1363  <... rt_sigprocmask resumed>NULL, 8) = 0
1374  <... madvise resumed>)          = 0
1373  <... madvise resumed>)          = 0
1372  madvise(0x7e85f6bf6000, 8368128, MADV_DONTNEED <unfinished ...>
1371  <... rt_sigprocmask resumed>NULL, 8) = 0
1370  <... exit resumed>)             = ?
1369  <... exit resumed>)             = ?
1368  <... madvise resumed>)          = 0
1367  <... rt_sigprocmask resumed>NULL, 8) = 0
1362  madvise(0x7e85fb3ff000, 8368128, MADV_DONTNEED <unfinished ...>
1374  exit(0 <unfinished ...>
1373  exit(0 <unfinished ...>
1372  <... madvise resumed>)          = 0
1371  madvise(0x7e85f73f7000, 8368128, MADV_DONTNEED <unfinished ...>
1370  +++ exited with 0 +++
1369  +++ exited with 0 +++
```

```
1368  exit(0 <unfinished ...>
1367  madvise(0x7e85f93fb000, 8368128, MADV_DONTNEED <unfinished ...>
1363  madvise(0x7e85fabfe000, 8368128, MADV_DONTNEED <unfinished ...>
1374  <... exit resumed>)             = ?
1373  <... exit resumed>)             = ?
1372  exit(0 <unfinished ...>
1371  <... madvise resumed>)          = 0
1368  <... exit resumed>)             = ?
1367  <... madvise resumed>)          = 0
1362  <... madvise resumed>)          = 0
1374  +++ exited with 0 +++
1373  +++ exited with 0 +++
1372  <... exit resumed>)             = ?
1371  exit(0 <unfinished ...>
1368  +++ exited with 0 +++
1367  exit(0 <unfinished ...>
1363  <... madvise resumed>)          = 0
1362  exit(0 <unfinished ...>
1372  +++ exited with 0 +++
1371  <... exit resumed>)             = ?
1367  <... exit resumed>)             = ?
1363  exit(0 <unfinished ...>
1371  +++ exited with 0 +++
1367  +++ exited with 0 +++
1362  <... exit resumed>)             = ?
1363  <... exit resumed>)             = ?
1361  <... futex resumed>)            = 0
```

```
1362  +++ exited with 0 +++
1361  munmap(0x7e85fb3ff000, 8392704 <unfinished ...>
1363  +++ exited with 0 +++
1361  <... munmap resumed>)             = 0
1361  munmap(0x7e85fabfe000, 8392704)   = 0
1361  munmap(0x7e85fa3fd000, 8392704)   = 0
1361  munmap(0x7e85f9bfc000, 8392704)   = 0
1361  munmap(0x7e85f93fb000, 8392704)   = 0
1361  munmap(0x7e85f8bfa000, 8392704)   = 0
1361  munmap(0x7e85f83f9000, 8392704)   = 0
1361  munmap(0x7e85f7bf8000, 8392704)   = 0
1361  write(1, "\n", 1)                 = 1
1361  write(1,
"\320\241\321\202\320\260\321\202\320\270\321\201\321\202\320\270\320\272\320\260
\320\262\321\213\320\277\320\276\320\273\320"..., 43) = 43
1361  write(1, "======================\n", 23) = 23
1361  write(1, "[job_a] \342\234\223
\320\243\321\201\320\277\320\265\321\210\320\275\320\276\n", 27) = 27
1361  write(1, "[job_b] \342\234\223
\320\243\321\201\320\277\320\265\321\210\320\275\320\276\n", 27) = 27
1361  write(1, "[job_c] \342\234\223
\320\243\321\201\320\277\320\265\321\210\320\275\320\276\n", 27) = 27
1361  write(1, "[job_d] \342\234\227
\320\236\321\210\320\270\320\261\320\272\320\260 (\320\272\320\276\320\264"..., 37)
= 37
1361  write(1, "[job_e] \342\227\213 \320\235\320\265
\320\262\321\213\320\277\320\276\320\273\320\275\320\265\320"..., 34) = 34
1361  write(1, "[job_f] \342\227\213 \320\235\320\265
\320\262\321\213\320\277\320\276\320\273\320\275\320\265\320"..., 34) = 34
1361  write(1, "\n", 1)                 = 1
```

1361 write(1, "\320\230\321\202\320\276\320\263\320\276: 3 \321\203\321\201\320\277\320\265\321\210\320\275\320\276, 1 "..., 77) = 77

1361 write(1, "\n", 1)   = 1

1361 write(1, "DAG \320\276\321\201\321\202\320\260\320\275\320\276\320\262\320\273\320\265\320\275\320\270\320\267-\320\267"..., 81) = 81

1361 exit_group(0)   = ?

1361 +++ exited with 0 +++

Вывод

В ходе курсового проекта был разработан планировщик выполнения задач (джобов), организованных в виде направленного ациклического графа (DAG). Программа реализована на языке C с использованием системных вызовов POSIX и синхронизации через мьютексы. Разработанный планировщик DAG полностью соответствует всем требованиям курсового проекта. Программа демонстрирует эффективное использование системных вызовов POSIX, правильную работу с многопоточностью и синхронизацией, а также надежную обработку ошибок. Программа успешно решает поставленную задачу: принимает описание DAG джобов, проверяет его корректность и выполняет с соблюдением зависимостей, немедленно прерывая выполнение при любой ошибке.