sd_bus_message_dump

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systemd

sd_bus_message_dump

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Produce a string representation of a message for debugging purposes

#include <systemd/sd-bus.h>

int sd_bus_message_dump

sd_bus_message *

m

FILE *

f

uint64_t

flags

int sd_bus_message_dump_json

sd_bus_message *

m

uint64_t

flags

sd_json_variant **

ret

Description

The `sd_bus_message_dump()` function writes a textual representation of the message `m` to the stream `f`. If `f` is `NULL`, standard output (`stdio`) will be used. This function is intended to be used for debugging purposes, and the output is neither stable nor designed to be machine readable.

The `sd_bus_message_dump_json()` function converts the DBus message `m` to a JSON variant and stores it in `ret`. The caller should call `sd_json_variant_unref()` for the acquired JSON variant after use. Unlike `sd_bus_message_dump()`, the function itself does not print anything. To print the DBus message in the JSON format, please pass the returned JSON variant to `sd_json_variant_dump()`.

The `flags` parameter may be used to modify the output, and is a combination of zero or more of the following flags:

`SD_BUS_MESSAGE_DUMP_WITH_HEADER`
The header of the message that specifies the message type, flags, and several more additional metadata will be printed or included in the resulting JSON object.

`SD_BUS_MESSAGE_DUMP_SUBTREE_ONLY`
Only the current container will be printed or converted. When the flag is *not* specified, the contents of the whole message will be printed or converted.

Note that these functions move the read pointer of the message. It may be necessary to reset the position afterwards, for example with `sd_bus_message_rewind(3)`.

Examples

Output for a signal message (with `SD_BUS_MESSAGE_DUMP_WITH_HEADER`):

```
‣ Type=signal  Endian=l  Flags=1  Version=1  Cookie=22
  Path=/value/a  Interface=org.freedesktop.DBus.Properties  Member=PropertiesChanged
  MESSAGE "sa{sv}as" {
```

```
        STRING "org.freedesktop.systemd.ValueTest";
        ARRAY "{sv}" {
                DICT_ENTRY "sv" {
                        STRING "Value";
                        VARIANT "s" {
                                STRING "object 0x1e, path /value/a";
                        };
                };
        };
        ARRAY "s" {
                STRING "Value2";
                STRING "AnExplicitProperty";
        };
};
```

Return Value

On success, this function returns 0 or a positive integer. On failure, it returns a negative errno-style error code. No error codes are currently defined.

See Also

`systemd(1)`, `sd-bus(3)`, `sd-json(3)`

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