

# Package: sdf (via r-universe)

July 4, 2024

**Title** What the Package Does (One Line, Title Case)

**Version** 0.0.0.9000

**Description** What the package does (one paragraph).

**License** MIT + file LICENSE

**Suggests** testthat (>= 3.0.0), usethis

**Config/testthat/edition** 3

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**Roxygen** list(markdown = TRUE)

**RoxygenNote** 7.2.3

**Imports** dplyr, geos, rlang, s2, sf, tibble, vctrs, wk

**Repository** <https://josiahparry.r-universe.dev>

**RemoteUrl** <https://github.com/josiahparry/sdf>

**RemoteRef** HEAD

**RemoteSha** e84a66ffdf2564954cf8d314cffd4954c53fcb

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is_geometry	<i>Required Generics</i>
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**Description**

Required Generics

**Usage**

is\_geometry(x)

bounding\_box(x)

combine\_geometry(x)

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sdf_geometry	<i>Geometry Accessor</i>
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**Description**

Geometry Accessor

**Usage**

sdf\_geometry(x)

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sdf_intersects	<i>Spatial Predicate Functions Predicates are optional, but enable the use of sdf_join().</i>
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**Description**

Predicates should return a sparse matrix list representation. The elements the list are an integer vector indicating the features where the predicate is TRUE. The vector must be the *row position*.

**Usage**

sdf\_intersects(x, y, ...)

sdf\_contains(x, y, ...)

sdf\_within(x, y, ...)

sdf\_crosses(x, y, ...)

sdf\_covers(x, y, ...)

sdf\_covered\_by(x, y, ...)

sdf\_equals(x, y, ...)

sdf\_disjoint(x, y, ...)

sdf\_touches(x, y, ...)

sdf\_overlaps(x, y, ...)

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sdf_join	<i>Left join only</i>
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**Description**

Left join only

**Usage**

sdf\_join(x, y, predicate = sdf\_intersects, ..., suffix = c("\_x", "\_y"))

**Arguments**

predicate      a function that returns a sparse matrix list representation

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sdf_length	<i>Optional Generics</i>
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**Description**

Optional Generics

**Usage**

```
sdf_length(x, ...)
```

```
sdf_area(x, ...)
```

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```
union_geometry      Primary Interface
```

---

**Description**

These functions are optional but strongly suggested.

**Usage**

```
union_geometry(x)
```

```
simplify_geometry(x, ...)
```

```
buffer_geometry(x, distance, ...)
```

```
centroid(x)
```

```
convex_hull(x)
```

```
concave_hull(x, concavity, ...)
```

---

```
use_sdf_template_class  
      Templates to extend sdf
```

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**Description**

These templates can be used to extend sdf by implementing a new compatible geometry vector column.

**Usage**

```
use_sdf_template_class(  
  class,  
  save_as = paste0("R/sdf-compat-", class, ".R"),  
  open = TRUE  
)  
  
use_sdf_template_zzz(class, save_as = "R/zzz.R", open = TRUE)
```

**Arguments**

<code>class</code>	a scalar character of the class name of your geometry class
<code>save_as</code>	Path of file to create, relative to root of active project. Defaults to <code>template</code>
<code>open</code>	Open the newly created file for editing? Happens in RStudio, if applicable, or via <code>utils::file.edit()</code> otherwise.

**Details**

- `use_sdf_template_class()` will create an R script with the scaffolding needed to implement your geometry class to be compatible with sdf.
- `use_sdf_template_zzz()` will create a `zzz.R` file that will export your methods to be available to sdf.

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