XPCE-5.0 Release Notes

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This document provides an overview of new functionality of XPCE-5. The highlights are single-file executables using embedded (image) resources, passing native Prolog data through arguments of Prolog-defined methods and the introduction of graphical tables.

CONTENTS

```
send(T, level_gap, 20),
send(T, node_handler,
click_gesture(left, '', single,
```



For example:

```
?- send(new(P, picture), open),
    send(P, display(box(100,100), point(10,10))).
```

Advantages of this representation are:

No limits to the number of argu7ents.

Generally easier specification of utility-predicates that wrap around the XPCE primitives as messages are represented using single Prolog term.

Possibility to define (efficiently) other syntaxes for XPCE.¹

3: CLASS-VARIABLES

The XPCE-4 notion of resources, expressing user-defaults, has been replaced by the notion of class-

Please note that when using this library, resources as defined in chapter 4 cannot appear inside a class-definition.

3.2: Consequences for the end-user

XPCE no longer uses the X11 resource-syntax. The syntax for a class-variable default value is defined as:

hclassi.hclass-variablei: hvaluei

Thus, the leading Pce. has been dropped and class-names are written in exact-case rather then capitalised. The value-syntax has not been changed.

The system defaults-file is located in \\$PCEHOME/Defaults, where \$PCEHOME refers to the XPCE home-directory (see '@pce home').i\text{i} the user is gletfarelts the tist dos yets d in (def)10(aulot)-24s-fi.s:

4: PROGRAM RESOURCES

?- send(image('myicon.ico'), save, 'myicon,xpm', xpm).

This transformation is complete as the XPM image format covers all aspects of the Microsoft image formats.

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5: ERRORS AND PROLOG EXCEPTIONS

XPCE-5.0 provides a mapping between XPCE errors and Prolog exceptions. For this reason a new 'error

7: LAYOUT MANAGERS

A Layout Manager is an object that is associated with a graphical **device** and which deals with managing the layout of the graphicals displayed on th**layout**ce. Layout-managers can 0ither manipulate the graphicals **_interface** object to each the graphicals managed. The

```
send(Table, sort_rows, ?(DL, compare_rows, @arg1, @arg2), 2).
56
57 compare_rows(DL, R1:table_row, R2:table_row, Result) :<-</pre>
            "Compare two rows on sort_a6hmm.bible_row.)owNle_row.)ow00(Gr2.);71/F48 493 BT /F48 4.981 Tf 0 0 Td[(56)]T1/F49 8.ie00(?(for_a66 Tw.)owNle_row.Gr2).
58
            get(DL, sort_column, ColName),
59
            get(R1, cell, ColName, C1),
60
            get(R2, cell, ColName, C2),
61
            get(C1, image, Gr1),
            get(C2, image, Gr2),
            get(Gr1, compare, Gr2, Result).
65 57get(DL,Ep-60:up-60olName, :<-58
58
```

7.2. EXAMPLE — SHOW CONTENTS OF A DIRECTORY IN A TABLE

```
send(Table, append, dir_value_text(Dir?name)),
send(Table, next_row).

append_file(DL, File:file) :->

Append a directory-row"::
get(DL, layout_manager, Table),
get(File, bysec_Table, NameOur_gert, synd$Table, samp(eTable, samp(eTable), samp(eTable)).
```

Normally, send_

send(

9: STATUS, DISCUSSION AND PLANS

9.1: Prolog interface

XPCE-5.0.0 is primarily an evaluation release for the new XPCE/Prolog interface. Except for the issues noted in these release notes (especially chapter A

A: MIGRATING OLD SOURCE CODE

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```

send7.156d.82 1 0 0 1 11.955 0 cm 1 0 0 rg 1 0 0 RG BT /F38 9.963 Tf 0 0 Td[(4)]TJ ET 1