Some PERL code for detecting/displaying "toroidal" trees "invariant under a half−turn"

Source: http://sci.tech−archive.net/Archive/sci.math.num−analysis/2004−08/0005.html

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Relevant sci.math background thread for this posting is:
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DAG/POSET "consultancy fee" conjecture:
sole thread here for all future postings
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Background

In the above mentioned thread, Dr. Jerry Rieper presents/
proves an algorithm for defining/enumerating all
"orderable DAGS", i.e. all DAGs that can be
consistently ordered so that their structure can
be correctly represented by a dim 2 poset.
This algorithm will be reviewed by Dr. David Wagner
(U Waterloo Ca) upon his return from vacation, but
Jerry's algorithm is believed to be correct by
Robin Houston, Guenter Stertenbrink, and Stas Busygin
who also did considerable work on the problem.

If Dr. Wagner's review of Dr. Rieper's algorithm
confirms its correctness (or if Dr. Wagner can correct
this algorithm so that it accomplishes the purpose),
then the results of Dr. Robert Jamison (Clemson)
concerning:

"trees invariant under a half−turn"

can more than likely be extended to

"oDAGs (ordered DAGs)" invariant under a half−turn.

To see VISUALLY (not ALGEBRAICALLY) what Dr. Jamison means
by "tree inavariant under a half−turn", consider the
labelled bracketing:

[a [b [c [d e]]]]
A B C D C B A

and its structure−preserving representation as the
dim 2 poset:

y

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8 a
7 b
6 c
5 d
4 e
3 D
2 C
1 B
0 A
0 1 2 3 4 5 6 7 8 −−>x

where:

i) one extension of the poset is 012345678 and the other
is 081726354

ii) the "directed edge" relationship in this diagram is
((xi,yi),(xj,yj)) such that xi < xj, yi <yj and no
(xk,yk) with xi < xk < xj and yi < yk < yj (i.e.
no intervening ancestor(s) of (xj,yj) and descendant(s)