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1 %%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%
2 %
3 %   Integrated Modified OLS Estimation and Fixed-b   %
4 %   Inference for Cointegrating Regressions         %
5 %   by T.J.Vogelsang and M.Wagner                   %
6 %
7 %%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%%
8
9
10
11
12 List of key functions:
13 -----
14 (for more details see the descriptions in Matlab-files)
15
16 -   IMOLS.m
17     (Computes the Vogelsang and Wagner (2014) IM-OLS estimator)
18     Input arguments:
19         - dependent variable y
20         - stochastic regressor matrix X
21         - deterministic regressor matrix D
22           or integer "d" to include polynomial regressors up to order d (default: 0)
23         - kernel for long-run variance computation (default: Bartlett)
24         - bandwidth for long-run variance computation or an appropriate computation procedure
25           (default: Andrews (1991) data dependent bandwidth selection method)
26         - significance level for t-tests (Default: 5%)
27
28 -   t_test_2sided_fb.m
29     (Performs a two-sided fixed-b t-test)
30     Input arguments:
31         - value of test statistic (to be calculated with IMOLS)
32         - kernel used (in IMOLS) for long-run variance estimation
33         - fixed "b" used for long-run variance estimation
34         - highest order of deterministic polynomials
35           (critical values only implemented for intercept and intercept + linear trend case)
36         - number of integrated regressors
37           (critical values only implemented for maximum 4 regressors)
38         - significance level
39
40 -   Wald_test_1sided_fb.m
41     (Performs a one-sided fixed-b Wald-test)
42     Input arguments:
43         - value of test statistic (to be calculated with IMOLS)
44         - kernel used (in IMOLS) for long-run variance estimation
45         - fixed "b" used for long-run variance estimation
46         - highest order of deterministic polynomials
47           (critical values only implemented for intercept and intercept + linear trend case)
48         - number of integrated regressors
49           (critical values only implemented for maximum 4 regressors)
50         - number of hypothesis
51           (critical values only implemented for up to 4 hypothesis)
52         - significance level
53
54     (If critical values for fixed-b based tests are not implemented,
55     the user is requested to enter the corresponding critical values,
56     available from
57     https://www.statistik.tu-dortmund.de/oekonometrie-research.html)
58
59
60 List of all functions included:
61 -----
62 (more information is given in the corresponding Matlab-files)
63
64 -   And_HAC91
65 -   bwNW
66 -   IMOLS
67 -   lr_var
68 -   lr_weights
69 -   poly_regressors
70 -   t_test_2sided_fb
71 -   Vhat_NEW
72 -   Wald_test_1sided_fb
73 -   Z_regressors
74
75
76 List of subfolders in IM-OLS:
77 -----
78
79 -   criticalvaluesimolstests
80     (contains fixed-b critical values)
81
82 (Please do not rename the files unless you make sure the paths
83 are modified correctly)
84

```