



T

29 2 pp.47-60 2021 3 .

2019 29 1 pp.59-72  
2020 10

Ryuji Ishizaki Masayoshi Inoue “Analysis of local and global instability in foreign exchange rates using short-term information entropy” Physica A Vol.555 No.1 pp.1-9 2020.

< >

2023

2023 3

2022 MIMS

2022 12

128

2022 12

2022

2022 2022 9

2021 MIMS

2022 3

77 2022 2022 3

127

2021 12

2020

2021 3

76

2021 2021 3

MIMS

Data-driven Mathematical Science 2

2020 12

126

2020 12

2020

2020 9

Ryuji Ishizaki Toshikazu Shinba Go Mugishima Hikaru Haraguchi and Masayoshi Inoue  
 “Time-series analysis of sleep-wake stage of rat EEG using time-dependent pattern  
 entropy” Physica A Vol.387 No.13 pp.3145-3154 2008.

1998

Ryuji Ishizaki Takehiko Horita Tatsuharu Kobayashi and Hazime Mori “Anomalous  
 Diffusion Due to Accelerator Modes in the Standard Map” Progress of Theoretical Physics  
 Vol.85 No.5 pp.1013-1022 1991.

APS

	1	1		2			2	1
		2	2			2	2	
	I	1	3		I	1	3	
	II	1	3		II	1	3	
1	3			2	3		6	4