

#### 地球动力学·地震学

- 1315 非洲南部地壳与上地幔地震波速度与径向各向异性特征及其对克拉通岩石圈中部不连续面的启示 ..... 张学臻, 李伦
- 1334 高压流体条件下叶蛇纹石摩擦特性及其对俯冲带慢滑移事件的启示 ..... 刘世民, 张雷, 何昌荣
- 1348 新疆天山中段地壳和上地幔顶部 P 波速度结构研究 ..... 刘建明, 吴传勇, 余怀忠, 王琼, 刘代芹, 赵彬彬, 高荣, 高歌, 孔祥艳
- 1363 2022 年 9 月 5 日四川泸定  $M_s6.8$  地震序列发震构造 ..... 易桂喜, 龙锋, 梁明剑, 赵敏, 张会平, 周荣军, 李勇, 刘欢, 吴朋, 王思维, 李俊, 吴微微, 苏金蓉
- 1385 2022 年 9 月 5 日四川泸定  $M_s6.8$  地震深部构造特征 ..... 李莹, 田建慧, 李心怡, 李抒予, 王琼, 高原
- 1397 2022 年四川泸定  $M_s6.8$  地震震源基本特征 ..... 张喆, 房立华, 许力生
- 1409 GNSS 资料解译 2022 年泸定  $M_w6.6$  地震 ..... 徐锐, 陈聪, 饶天国, 刘雪梅, 罗凌
- 1419 联合高频 GNSS 和强震数据快速反演四川泸定 6.8 级地震断层破裂特征 ..... 郑佳伟, 李敏, 方荣新, 吕黄晖, 刘经南
- 1428 2022 年四川泸定  $M_s6.8$  地震前地下介质视电阻率变化特征及其机理分析 ..... 解滔, 任越霞, 廖晓峰, 何畅, 于晨, 韩盈, 卢军
- 1438 基于震前高分影像和震害仿真的建筑物震害快速评估: 以四川泸定 6.8 级地震为例 ..... 袁小祥, 林旭川, 窦爱霞, 王书民, 张雪华, 肖本夫, 刘智

- 1448 2021 年 5 月漾濞  $M_s6.4$  地震序列发震机理的应力分析 ..... 李振月, 李俊伦, 姚华建, 王宝善
- 1460 青海门源地区地震活动时空分布特征和孕震环境研究 ..... 左可桢, 罗钧, 赵翠萍, 陈继锋, 尹欣欣
- 1481 2021 年新疆皮山  $M_s5.4$  和叶城  $M_s5.4$  双震序列及青藏高原西北缘地震活动特征 ..... 罗钧, 左可桢, 赵翠萍
- 1496 巴颜喀拉块体中东段  $M_s \geq 7.0$  地震卫星红外辐射时间序列变化特征 ..... 张铁宝, 杨星, 路茜, 龙锋, 管勇
- 1508 2018 年台湾海峡 6.2 级地震前地震活动及应力状态研究 ..... 刘特培, 谭争光, 李晓慧, 杨选, 刘吉平, 邓志辉
- 1525 影像大地测量数据揭示 2021 希腊塞萨利地震序列潜在断层几何及其区域构造意义 ..... 周成, 马张烽, 吕达
- 1545 长白山天池火山西南麓水压致裂法地应力测量及其实测数据在断裂稳定性分析中的应用 ..... 乔二伟, 马秀敏, 彭华, 张文汇, 翟玉栋, 李嘉瑞
- 1558 基于机器学习和台阵相关性的水力压裂微地震事件自动识别及到时拾取 ..... 陈国艺, 杨文, 谭玉阳, 张海江, 李俊伦

#### 地磁学·地电学·海洋地球物理学

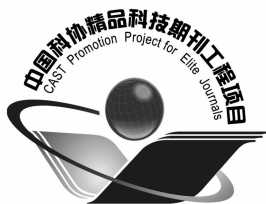
- 1575 基于深度神经网络的地磁观测数据高压直流输电干扰事件识别 ..... 单维锋, 闫非石, 刘海军, 李志扬, 刘高川, 陈俊
- 1589 塔里木盆地前寒武系地层重磁电物性建模及储层激电响应特征 ..... 向葵, 严良俊, 胡华, 杨辉, 文百红, 苏洲

- 1603 切穿兴蒙造山带的深断面——岩石圈电性结构及改造模式 …… 慕倩, 韩江涛, 刘立家, 侯贺晟, 刘文玉, 刘国兴, 梁宏达, 吴懿豪, 辛中华
- 1618 东太平洋北部洋中脊上地壳精细结构地震探测 …… 狄会哲, 谢文鑫, 徐敏
- 1634 加利福尼亚湾温盐阶梯的发现 …… 孟令寒, 宋海斌, 梁智超, 范文豪, 刘梦丽, 杨顺

## 应用地球物理学

- 1649 基于像素差分神经网络的断层识别方法 ……  
…………… 马啸, 姚刚, 张峰, 吴迪
- 1664 基于数据分布域变换与贝叶斯神经网络的渗透率预测及不确定性估计 …… 李明轩, 韩宏伟, 刘浩杰, 桑文镜, 袁三一
- 1681 基于散射理论与动态时间规整的时移地震波

- 动方程差异反演 …… 魏书映, 陈小宏, 李景叶, 黄广谭
- 1699 井中地震三维高效黏声逆时偏移成像方法及应用 …… 谷丙洛, 王霖川, 李振春, 魏国华, 孙卫国, 孔庆丰
- 1718 基于时频分析与分数阶最优控制网络的地震数据噪声压制 …… 邵丹, 李桐林, 韩立国, 李月, 吴宁
- 1732 单船拖曳可控源电磁数据自适应分频匹配滤波消噪方法 …… 崔扬, 刘洋, 殷长春, 王典, 惠哲剑
- 1743 虚拟波场降速条件下电性源瞬变电磁垂直磁场分量的波场反变换方法 …… 范克睿, 王刚, 鲁凯亮, 郑新, 李貅, 孙兴邦
- 1758 回线源地-空瞬变电磁系统及其在滑坡探测中的应用 …… 武军杰, 智庆全, 李貅, 陈晓东, 李滨, 黄跃, 邓晓红, 王兴春, 刘雨歌, 李军, 赵毅



Contents

Geodynamics · Seismology

- 1315 Seismic velocity and radial anisotropy images of the crust and upper mantle beneath the southern Africa and their implications for cratonic mid-lithosphere discontinuity ..... ZHANG XueZhen, LI Lun
- 1334 Frictional properties of antigorite under high pore-fluid pressure and implications for slow-slip events in subduction zones ... LIU ShiMin, ZHANG Lei, HE ChangRong
- 1348 P-wave velocity structure of the crust and uppermost mantle in the middle of Tianshan ..... LIU JianMing, WU ChuanYong, YU HuaiZhong, WANG Qiong, LIU DaiQin, ZHAO BinBin, GAO Rong, GAO Ge, KONG XiangYan
- 1363 Seismogenic structure of the 5 September 2022 Sichuan Luding  $M_s$ 6.8 earthquake sequence ..... YI GuiXi, LONG Feng, LIANG MingJian, ZHAO Min, ZHANG HuiPing, ZHOU RongJun, LI Yong, LIU Huan, WU Peng, WANG SiWei, LI Jun, WU WeiWei, SU JinRong
- 1385 Deep tectonic pattern of the Luding  $M_s$ 6.8 earthquake on 5th September 2022 in Sichuan Province, China ..... LI Ying, TIAN JianHui, LI XinYi, LI ShuYu, WANG Qiong, GAO Yuan
- 1397 Primary source characteristics of the 2022 Sichuan Luding  $M_s$ 6.8 Earthquake ..... ZHANG Zhe, FANG LiHua, XU LiSheng
- 1409 Interpretation of the 2022 Luding  $M_w$ 6.6 earthquake based on GNSS data ..... XU Rui, CHEN Cong, RAO TaiGuo, LIU XueMei, LUO Ling
- 1419 Rapid inversion of fault rupture characteristics for the Luding  $M$ 6.8 earthquake in Sichuan with high-rate GNSS and strong-motion data ..... ZHENG JiaWei, LI Min, FANG RongXin, LÜ HuangHui, LIU JingNan
- 1428 Changes in apparent resistivity and its possible mechanisms before the Luding  $M_s$ 6.8 earthquake on September 5, 2022, Sichuan province, China ..... XIE Tao, REN YueXia, LIAO XiaoFeng, HE Chang, YU Chen, HAN Ying, LU Jun
- 1438 Rapid assessment of building seismic damage based on pre-earthquake high-resolution images and seismic simulation, taking the Luding  $M$ 6.8 earthquake in Sichuan as an example ..... YUAN XiaoXiang, LIN XuChuan, DOU AiXia, WANG ShuMin, ZHANG XueHua, XIAO BenFu, LIU Zhi
- 1448 Stress analysis for the seismogenic mechanism of the Yangbi  $M_s$ 6.4 earthquake sequence in May 2021 ..... LI ZhenYue, LI JunLun, YAO HuaJian, WANG BaoShan
- 1460 Spatiotemporal distribution characteristics of seismicity and seismogenic environment in the Menyuan area, Qinghai Province ..... ZUO KeZhen, LUO Jun, ZHAO CuiPing, CHEN JiFeng, YIN XinXin
- 1481 The 2021 Pishan  $M_s$ 5.4 and Yecheng  $M_s$ 5.4 Earthquake doublet and seismicity feature in the Northwestern margin of the Tibetan Plateau ..... LUO Jun, ZUO KeZhen, ZHAO CuiPing
- 1496 Variation features of satellite infrared radiation time series associated with  $M_s \geq 7.0$  earthquakes occurred in the Mid-Eastern Bayan Har block ..... ZHANG TieBao, YANG Xing, LU Qian, LONG Feng, GUAN Yong
- 1508 Research on the seismic activity and stress state before the Taiwan strait 6.2 earthquake in 2018 .....

..... LIU TePei, TAN ZhengGuang, LI XiaoHui,  
YANG Xuan, LIU JiPing, DENG ZhiHui

**1525 Imaging geodesy data reveals potential fault geometry and regional tectonic implications of the 2021 Greece Thessaly earthquake sequence** .....

..... ZHOU Cheng, MA ZhangFeng, LÜ Da

**1545 Hydraulic fracturing tests for stress measurements and analysis of stability for frictional sliding of faults at the Southwest foot area of Tianchi volcano in Changbaishan Mountains** ... QIAO ErWei, MA XiuMin, PENG Hua,

ZHANG WenHui, ZHAI YuDong, LI JiaRui

**1558 Automatic phase detection and arrival picking for microseismic events in hydraulic fracturing based on machine learning and array correlation** .....

..... CHEN GuoYi, YANG Wen, TAN YuYang,  
ZHANG HaiJiang, LI JunLun

## Geomagnetism • Geoelectricity • Marine Geophysics

**1575 Recognition of HVDC transmission disturbance events in geomagnetic observation data based on deep neural network** .....

..... SHAN WeiFeng, YAN FeiShi, LIU HaiJun,  
LI ZhiYang, LIU GaoChuan, CHEN Jun

**1589 Physical modeling of density, susceptibility and resistivity and reservoir IP response characteristics of the Pre-Cambrian formation in Tarim Basin** .....

..... XIANG Kui, YAN LiangJun, HU Hua,  
YANG Hui, WEN BaiHong, SU Zhou

**1603 The deep section cutting through the Xing'an Mongolia Orogenic Belt: Lithospheric resistivity structure and modification model** .....

..... MU Qian, HAN JiangTao,  
LIU LiJia, HOU HeSheng, LIU WenYu, LIU GuoXing,  
LIANG HongDa, WU YiHao, XIN ZhongHua

**1618 Seismic investigation of fine-scale upper crust structure along the northern East Pacific Rise** .....

..... DI HuiZhe, XIE WenXin, XU Min

**1634 Discovery of thermohaline staircases in the Gulf of California**

..... MENG LingHan, SONG HaiBin, LIANG ZhiChao,

FAN WenHao, LIU MengLi, YANG Shun

## Applied geophysics

**1649 Fault detection method based on pixel difference network**

..... MA Xiao, YAO Gang, ZHANG Feng, WU Di

**1664 Permeability prediction and uncertainty quantification base on Bayesian neural network and data distribution domain transformation** .....

..... LI MingXuan, HAN HongWei,  
LIU HaoJie, SANG WenJing, YUAN SanYi

**1681 Wave-equation-based time-lapse seismic inversion by using dynamic time warping and scattering theory** .....

... WEI ShuYing, CHEN XiaoHong, LI JingYe,  
HUANG GuangTan

**1699 3D efficient visco-acoustic reverse time migration in borehole seismic and its application** .....

... GU BingLuo, WANG JiChuan, LI ZhenChun,  
WEI GuoHua, SUN WeiGuo, KONG QingFeng

**1718 Fractional optimal control network based on time-frequency analysis for noise suppression of seismic data** .....

..... SHAO Dan, LI TongLin, HAN LiGuo,  
LI Yue, WU Ning

**1732 Denoising single-ship towed MCSEM data with adaptive frequency-division matching filter** .....

..... CUI Yang, LIU Yang, YIN ChangChun,  
WANG Dian, HUI ZheJian

**1743 Inverse wavefield transform of vertical magnetic signal of galvanic source TEM when slowing down pseudo-wavefield velocity** .....

..... FAN KeRui, WANG Gang,  
LU KaiLiang, ZHENG Xin, LI Xiu, SUN XingBang

**1758 Loop source semi-airborne TEM system and its application in landslide detection** ...

WU JunJie, ZHI QingQuan,  
LI Xiu, CHEN XiaoDong, LI Bin, HUANG Yue,  
DENG XiaoHong, WANG XingChun, LIU YuGe,

LI Jun, ZHAO Yi