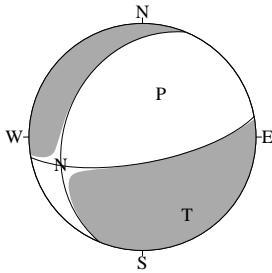


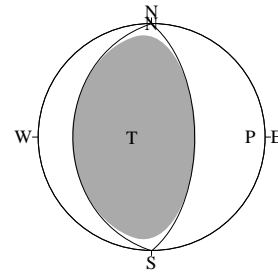
CMT SOLUTIONS FOR EARTHQUAKES IN DECEMBER, 2020

2020/12/01 07:54:33.0
SOUTH SAKHALIN
Hypo.:48° 5.8'N 141°10.8'E 619km



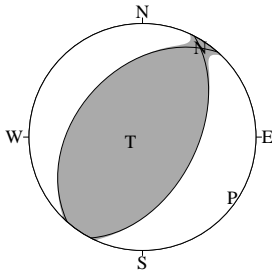
Cent.:48° 2.0'N 141°14.7'E 613km $\Delta t = 5.0$
Mo: 4.49×10^{18} N·m Mw:6.4 Mj:6.7 (sec)
mrr:-2.40 mtt: 1.72 mff: 0.68
mrt:-3.25 mrf:-0.02 mtf: 2.25 ($\times 10^{18}$ N·m)
STR DIP SLIP MOM AZM PLG
NP1: 80° 71° -64° P-axis:-4.43 23° 56°
NP2:202° 32° -143° T-axis: 4.56 150° 22°
N-axis:-0.13 251° 25°
V.R.: 86% ϵ : 0.03 N:19 COMP:47

2020/12/06 13:06:50.8
E OFF HACHIJOJIMA ISLAND
Hypo.:33°35.3'N 141° 9.2'E 63km



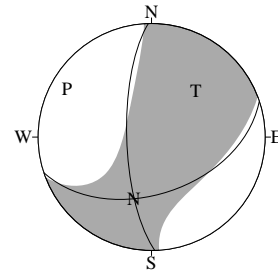
Cent.:33°39.4'N 141°11.7'E 62km $\Delta t = 0.5$
Mo: 2.40×10^{16} N·m Mw:4.9 Mj:5.0 (sec)
mrr: 2.18 mtt:-0.10 mff:-2.07
mrt:-0.01 mrf: 1.11 mtf: 0.00 ($\times 10^{16}$ N·m)
STR DIP SLIP MOM AZM PLG
NP1:360° 59° 90° P-axis:-2.35 90° 14°
NP2:180° 31° 90° T-axis: 2.45 269° 76°
N-axis:-0.10 0° 0°
V.R.: 67% ϵ : 0.04 N:11 COMP:25

2020/12/10 14:29:37.5
TAIWAN REGION
Hypo.:23°25.5'N 121°34.7'E 39km



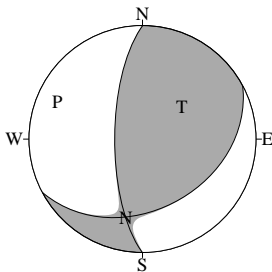
Cent.:23°21.0'N 121°34.3'E 38km $\Delta t = 1.5$
Mo: 3.05×10^{16} N·m Mw:4.9 Mj:4.8 (sec)
mrr: 2.93 mtt:-0.90 mff:-2.03
mrt: 0.00 mrf: 0.66 mtf:-1.45 ($\times 10^{16}$ N·m)
STR DIP SLIP MOM AZM PLG
NP1: 27° 51° 81° P-axis:-3.07 124° 5°
NP2:222° 40° 101° T-axis: 3.03 250° 81°
N-axis: 0.05 33° 7°
V.R.: 82% ϵ :-0.02 N:7 COMP:14

2020/12/10 22:19:57.7
TAIWAN REGION
Hypo.:24°42.1'N 121°58.1'E 86km



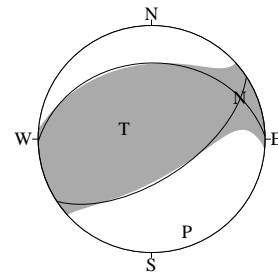
Cent.:24°35.7'N 121°58.8'E 70km $\Delta t = 7.8$
Mo: 2.59×10^{18} N·m Mw:6.2 Mj:6.3 (sec)
mrr: 1.18 mtt: 0.26 mff:-1.45
mrt: 0.13 mrf:-1.32 mtf:-1.87 ($\times 10^{18}$ N·m)
STR DIP SLIP MOM AZM PLG
NP1: 72° 48° 156° P-axis:-2.93 300° 15°
NP2:178° 72° 44° T-axis: 2.26 44° 43°
N-axis: 0.66 196° 43°
V.R.: 78% ϵ :-0.23 N:9 COMP:23

2020/12/11 03:15: 8.3
TAIWAN REGION
Hypo.:24°28.7'N 121°58.9'E 67km



Cent.:24°33.4'N 121°58.9'E 57km $\Delta t = 2.2$
Mo: 3.25×10^{16} N·m Mw:4.9 Mj:4.9 (sec)
mrr: 1.76 mtt: 0.02 mff:-1.77
mrt: 0.57 mrf:-2.10 mtf:-1.66 ($\times 10^{16}$ N·m)
STR DIP SLIP MOM AZM PLG
NP1: 62° 38° 146° P-axis:-3.27 294° 19°
NP2:180° 70° 57° T-axis: 3.23 51° 53°
N-axis: 0.03 192° 30°
V.R.: 82% ϵ :-0.01 N:9 COMP:20

2020/12/11 18:48:41.8
NEAR MIYAKOJIMA ISLAND
Hypo.:24°16.1'N 125°14.7'E 41km

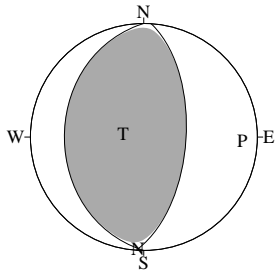


Cent.:24°11.5'N 125°14.5'E 35km $\Delta t = 4.3$
Mo: 5.58×10^{16} N·m Mw:5.1 Mj:5.2 (sec)
mrr: 4.26 mtt:-4.65 mff: 0.38
mrt: 2.02 mrf: 1.96 mtf:-1.90 ($\times 10^{16}$ N·m)
STR DIP SLIP MOM AZM PLG
NP1: 57° 61° 73° P-axis:-5.93 159° 14°
NP2:268° 33° 117° T-axis: 5.23 291° 69°
N-axis: 0.71 65° 15°
V.R.: 83% ϵ :-0.12 N:8 COMP:15

EQUAL AREA PROJECTON, LOWER HEMISPHERE.

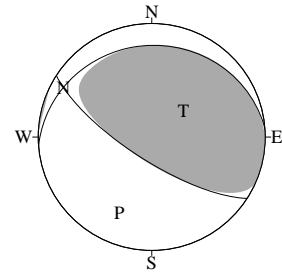
Hypo.:Location of hypocenter, Cent.:Location of centroid, Δt :Centroid time minus origin time
Mo:Total scalar moment, Mw:Moment Magnitude, Mj:JMA Magnitude
mrr,mtt,mff,mrt,mrf,mtf: Moment tensor components, STR,DIP,SLIP:Fault parameters of nodal plane
MOM,AZM,PLG: Moment tensor component, azimuth and plunge of P-, T-, N-axis
V.R.:Variance Reduction, ϵ :Non-double couple component ratio, N:Number of stations, COMP:Number of components

2020/12/12 16:18:54.3
NE OFF IWATE PREF
Hypo.:40° 5.6'N 142° 6.5'E 48km



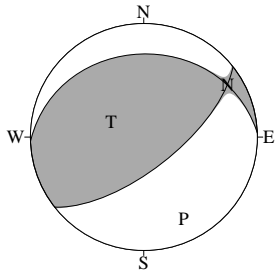
Cent.:40° 9.9'N 142° 6.7'E 59km $\Delta t = 3.5$
Mo: $2.60 \times 10^{17} \text{N}\cdot\text{m}$ Mw:5.5 Mj:5.6 (sec)
mrr: 2.28 mtt:-0.03 mff:-2.24
mrt: 0.13 mrf: 1.24 mtf:-0.07 ($\times 10^{17} \text{N}\cdot\text{m}$)
STR DIP SLIP MOM AZM PLG
NP1: 4° 59° 92° P-axis:-2.60 92° 14°
NP2:180° 31° 87° T-axis: 2.60 279° 75°
N-axis: 0.00 183° 2°
V.R.: 82% ϵ : 0.01 N:34 COMP:76

2020/12/16 10:28: 7.3
SE OFF TOKACHI
Hypo.:42°41.4'N 144°12.0'E 66km



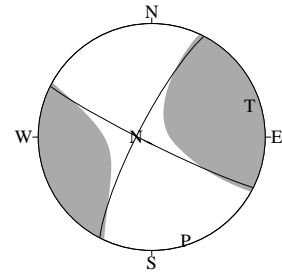
Cent.:42°38.4'N 144°12.0'E 51km $\Delta t = 2.0$
Mo: $3.85 \times 10^{16} \text{N}\cdot\text{m}$ Mw:5.0 Mj:5.0 (sec)
mrr: 2.13 mtt:-2.12 mff:-0.01
mrt: 2.50 mrf:-1.95 mtf: 0.49 ($\times 10^{16} \text{N}\cdot\text{m}$)
STR DIP SLIP MOM AZM PLG
NP1:123° 74° 102° P-axis:-3.75 203° 28°
NP2:266° 20° 55° T-axis: 3.94 50° 60°
N-axis:-0.19 299° 12°
V.R.: 76% ϵ : 0.05 N:21 COMP:37

2020/12/17 16:42:44.2
SW IBARAKI PREF
Hypo.:36° 3.4'N 139°56.2'E 45km



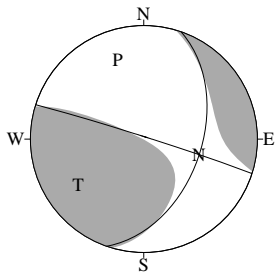
Cent.:36° 2.3'N 139°56.4'E 45km $\Delta t = 0.6$
Mo: $1.29 \times 10^{16} \text{N}\cdot\text{m}$ Mw:4.7 Mj:4.6 (sec)
mrr: 0.89 mtt:-0.86 mff:-0.02
mrt: 0.60 mrf: 0.64 mtf:-0.36 ($\times 10^{16} \text{N}\cdot\text{m}$)
STR DIP SLIP MOM AZM PLG
NP1: 52° 67° 74° P-axis:-1.29 154° 21°
NP2:268° 27° 123° T-axis: 1.29 296° 64°
N-axis: 0.01 58° 14°
V.R.: 75% ϵ : 0.00 N:29 COMP:49

2020/12/18 18:09:56.6
NEAR NIIJIMA ISLAND
Hypo.:34°29.2'N 139°18.2'E 11km



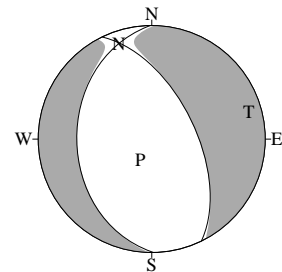
Cent.:34°28.5'N 139°18.2'E 10km $\Delta t = 3.5$
Mo: $2.47 \times 10^{16} \text{N}\cdot\text{m}$ Mw:4.9 Mj:5.0 (sec)
mrr:-0.33 mtt:-1.78 mff: 2.11
mrt: 0.29 mrf:-0.48 mtf:-1.43 ($\times 10^{16} \text{N}\cdot\text{m}$)
STR DIP SLIP MOM AZM PLG
NP1:207° 80° 5° P-axis:-2.26 162° 4°
NP2:117° 86° 170° T-axis: 2.68 72° 10°
N-axis:-0.42 273° 79°
V.R.: 90% ϵ : 0.16 N:21 COMP:44

2020/12/18 20:36:33.0
NEAR NIIJIMA ISLAND
Hypo.:34°30.1'N 139°18.4'E 8km



Cent.:34°30.1'N 139°19.0'E 10km $\Delta t = 0.5$
Mo: $7.41 \times 10^{15} \text{N}\cdot\text{m}$ Mw:4.5 Mj:4.6 (sec)
mrr:-0.06 mtt:-2.95 mff: 3.01
mrt:-4.45 mrf: 2.47 mtf:-4.60 ($\times 10^{15} \text{N}\cdot\text{m}$)
STR DIP SLIP MOM AZM PLG
NP1: 19° 48° 2° P-axis:-6.85 342° 27°
NP2:288° 88° 138° T-axis: 7.97 235° 30°
N-axis:-1.12 106° 48°
V.R.: 76% ϵ : 0.14 N:18 COMP:27

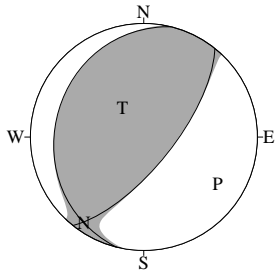
2020/12/20 10:54:25.6
FAR E OFF IZU ISLANDS
Hypo.:33°32.3'N 142° 4.8'E 39km



Cent.:33°30.7'N 142° 6.3'E 15km $\Delta t = 1.1$
Mo: $1.99 \times 10^{16} \text{N}\cdot\text{m}$ Mw:4.8 Mj:4.8 (sec)
mrr:-1.70 mtt:-0.02 mff: 1.73
mrt: 0.59 mrf:-0.68 mtf:-0.45 ($\times 10^{16} \text{N}\cdot\text{m}$)
STR DIP SLIP MOM AZM PLG
NP1:334° 58°-104° P-axis:-1.97 209° 73°
NP2:179° 34° -69° T-axis: 2.01 74° 12°
N-axis:-0.05 341° 12°
V.R.: 85% ϵ : 0.02 N:19 COMP:30

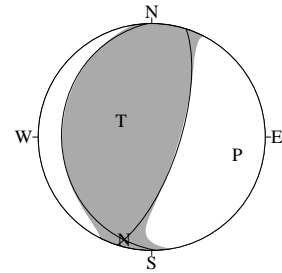
EQUAL AREA PROJECTON, LOWER HEMISPHERE.

2020/12/20 18:35:47.3
 E OFF MIYAGI PREF
 Hypo.:38°42.0'N 142°15.6'E 42km



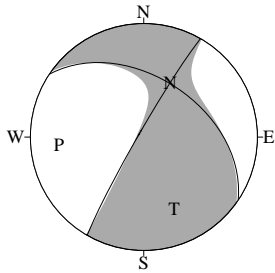
Cent.:38°43.1'N 142°16.2'E 42km $\Delta t = 0.5$
 Mo: $8.71 \times 10^{15} \text{N}\cdot\text{m}$ Mw:4.6 Mj:4.6 (sec)
 mrr: 5.52 mtt:-0.80 mff:-4.72
 mrt: 4.39 mrf: 4.78 mtf:-2.66 ($\times 10^{15} \text{N}\cdot\text{m}$)
 STR DIP SLIP MOM AZM PLG
 NP1: 39° 69° 99° P-axis:-8.84 122° 24°
 NP2:194° 22° 67° T-axis: 8.57 324° 64°
 N-axis: 0.28 215° 9°
 V.R.: 79% ϵ :-0.03 N:17 COMP:25

2020/12/21 02:23:21.5
 E OFF AOMORI PREF
 Hypo.:40°46.9'N 142°41.5'E 43km



Cent.:40°45.4'N 142°41.5'E 38km $\Delta t = 5.0$
 Mo: $3.90 \times 10^{18} \text{N}\cdot\text{m}$ Mw:6.3 Mj:6.5 (sec)
 mrr: 2.39 mtt: 0.24 mff:-2.63
 mrt: 1.01 mrf: 2.76 mtf:-0.44 ($\times 10^{18} \text{N}\cdot\text{m}$)
 STR DIP SLIP MOM AZM PLG
 NP1: 18° 70° 97° P-axis:-4.01 102° 24°
 NP2:178° 21° 71° T-axis: 3.78 299° 65°
 N-axis: 0.23 195° 7°
 V.R.: 78% ϵ :-0.06 N:22 COMP:51

2020/12/29 04:23:20.4
 S OFF KII PENINSULA
 Hypo.:33°12.9'N 135°53.9'E 444km



Cent.:33°13.3'N 135°53.5'E 445km $\Delta t = 1.2$
 Mo: $3.85 \times 10^{16} \text{N}\cdot\text{m}$ Mw:5.0 Mj:5.2 (sec)
 mrr: 0.46 mtt: 2.35 mff:-2.80
 mrt:-1.25 mrf:-2.29 mtf: 1.15 ($\times 10^{16} \text{N}\cdot\text{m}$)
 STR DIP SLIP MOM AZM PLG
 NP1:210° 86° 137° P-axis:-4.02 265° 26°
 NP2:304° 47° 5° T-axis: 3.68 157° 32°
 N-axis: 0.33 26° 46°
 V.R.: 89% ϵ :-0.08 N:42 COMP:76

EQUAL AREA PROJECTON, LOWER HEMISPHERE.