

# Index

- Africa 110, 282
- Anhui Province 155, 157, 225, 227, 228, 244
- Annual Census of Chinese Industrial Firms 135
- Asia 22, 76, 77, 79, 109, 121, 309, 345
- Asian economies 3, 44, 76, 77, 79, 103, 113, 116, 120, 345
  - savings glut 9, 97, 113, 120
- Asian Development Bank 38
- Asian Financial Crisis 3
- Association of Southeast Asian Nations (ASEAN) 82
- Australia 78, 109, 111, 113, 116, 174, 301, 303, 304, 310, 319
  - climate change 281, 284, 285–86, 289, 291, 293, 296–99
- Beijing 51, 165, 166, 208, 251, 263, 284, 304, 306
- Beijing Province 128, 129, 157, 225, 226, 227, 228, 244
- Brazil
  - GDP 303
- business environment 11–12, 141, 221–49
  - census, national 56–57, 64, 65
  - changing 223–24
  - enterprises, types of 233–43
  - provincial 225–28
  - regional 244–45
- business environment index for China's provinces (BEICP) 222, 223, 225, 226, 246, 247, 248
- Bush, George W. 285, 290, 292
- Canada 174, 287, 290, 303, 304
- China Banking Regulatory Commission 214
- China Development Research Foundation (CDRF) 57
- China Investment Corporation (CIC) 98, 108–09
- China National Petroleum Company 315
- Chinese
  - agricultural development 147, 150
    - challenges 171–76
    - fertilisation 152–53, 173, 273
    - fertility 147, 173
    - output 148, 273
    - policy 148, 163–71
    - production 148, 150, 152, 154, 158
    - total factor productivity (TFP) 155–156
  - economy
    - consumption share 35, 36, 41, 42, 43, 45, 46–47, 51
    - current account surplus 4, 7, 36, 39, 83, 84, 97, 99, 101, 102, 107, 118
    - debt 9, 97, 98, 105, 108, 110, 116, 118, 119, 120–21
      - provincial debt 9, 11, 25, 105, 120, 214, 215–16
    - factor markets 7, 8, 36–37, 43, 44, 45, 49, 51, 84, 85, 92, 93, 135, 270, 324
    - GDP 7, 15, 17, 25, 27, 35, 36, 39, 42, 43, 45, 46, 48, 50, 76, 77, 79, 82, 85, 86, 88, 89, 90, 91, 93, 101, 102, 104, 105, 106, 107, 109, 111, 128, 136, 138, 139, 140, 141, 158, 159, 199, 205, 206, 209, 226, 267, 276, 301, 302, 303, 304, 305, 306, 318, 348, 350, 351, 352, 353, 354, 355, 356, 357–58
      - slowing 36–38
    - global performance 97, 110–13, 116–18
    - growth of 30–31, 32, 35, 36–38, 41–42, 55–71, 100–01, 106, 127, 200, 224, 251, 293, 301, 304, 305
    - innovation 125–27
    - investment share 51, 79
    - new model of economic growth 1–6, 17–18, 35–36, 39–43
    - 'new normal' 7, 35, 36, 39, 43–50, 51
    - policy 51–52, 142

- potential growth rate 56–59, 63, 66–67, 68, 69
- public finances 199–216
  - public investment management 210–15
  - reform 200–04, 215–16
  - revenue 204–08
- purchasing power parity 76, 77, 78, 80, 81, 302, 304
- quantitative easing (QE) 9, 97, 98, 114–21
- rebalancing 36, 39–42, 44, 45, 47, 49, 51, 98–99, 107
- saving 1, 2, 3, 8–9, 35, 45, 55–57, 60–61, 83, 89, 97–98, 100, 101, 102, 106–08, 110, 111, 112–13, 118–21, 272
  - corporate 104–05
  - government 105–06, 111
  - household 103–04, 108, 111
  - reserves 108–10
- education 28, 32, 50, 67, 90, 100, 125, 134, 238, 240, 243, 271
  - access to 83, 89, 90, 167, 271
  - investment in 5, 47, 52, 89, 202, 203, 206, 225, 246
  - migrant 49, 90, 190, 195–96
  - reform 2, 5, 32
  - rural 6, 28, 167, 196
  - urban 28, 195, 196
- government 9, 12, 16, 45, 57, 70, 105, 106, 118, 120, 125, 141, 164, 273, 293, 336, 359
  - bonds 98, 114, 118, 213
  - construction permits 19–21,
  - corruption within 4, 6, 18–24, 49, 51, 202, 225
    - rent seeking 20, 21–22, 24, 83, 85, 88, 91, 92, 243
  - Ministry of Agriculture 155, 167
  - Ministry of Construction 214
  - Ministry of Finance (MOF) 11, 14, 199, 201, 202, 204, 205, 208, 209, 214, 216
  - Ministry of Human Resources and Social Security (MOHRSS) 207, 208
  - Ministry of Land and Resources 208, 314
  - labour 5, 7–8, 10, 16, 26, 27, 28, 29, 31, 32, 35, 36, 38, 43–44, 45, 46, 47–48, 50–51, 55–59, 60, 61–71, 83, 84, 85, 88, 89, 90, 100, 126, 147, 162, 171–72, 179, 180–86, 189, 193, 194–96, 224, 252, 253, 258–59, 269–71, 314, 324, 330, 342, 358
    - labour force participation 7, 56, 58, 63–67
    - labour force participation rate (LFPR) 56, 58, 59, 63, 64–65, 66, 67
  - local government revenue 24–26
  - non-state enterprise (NSE) 12, 233–34, 242, 246
  - population 10, 21, 27, 28, 29, 50, 55–58, 60, 66, 70, 103, 125, 196, 302, 304, 306, 318
    - ageing 28, 66, 208
    - demographic dividend 29, 55
    - demographic change 56, 61, 88, 100, 101, 179, 180–81, 302, 314, 319, 358
    - growth 58–64
    - rural 25, 26, 168, 172, 180–81, 186, 196
    - urban 26, 28, 30, 75, 79, 180–81
    - working age 4, 7, 38, 46, 55, 56, 56, 57, 59, 62–64, 66, 70
  - state-owned enterprise (SOE) 3, 12, 23, 31, 44, 48, 49, 52, 70, 90, 92, 100, 101, 104, 105, 107, 108, 135, 142, 152, 204, 207, 208, 221, 222, 224, 233–34, 242, 246, 276, 315, 321–22
- Chongqing Province 157, 179, 208, 225, 226, 227, 228, 244
- climate change 273, 281–86, 289, 290, 292, 297–99
  - pollution 4, 16, 19, 65, 85, 251, 262, 271, 272, 273, 276, 277, 315, 358
- coal 15, 152, 253, 263, 274, 276, 284, 292, 295, 296, 302, 306, 309, 310, 311, 312, 314–15, 316–18, 319

- coal bed methane 276, 315
- consumption 294, 295, 312, 317
- mining 255, 256, 260, 261, 317
- pricing 86
- tons of coal equivalent (TCE) 253
- Communist party 1, 2, 4, 23, 24, 25
  - discretionary power 20–21, 23
  - role in the economy 22
- construction 31, 49, 165, 169, 174, 175, 206, 212, 213, 214, 238, 239, 240, 274, 301, 322
- Cultural Revolution 2, 23
- data envelopment analysis (DEA) 252, 253, 254, 263
- directional distance function (DDF) 252–53, 254, 263
- emissions 14, 252–53, 276, 277, 285, 286, 287, 289, 292, 293, 294, 295, 296, 297, 298, 302, 307, 318
  - carbon 12, 13–14, 152, 251, 253, 254–57, 258–60, 262, 263, 268, 273, 276, 277, 284
  - intensity targets 14, 79, 255, 256, 257, 262, 269, 273, 276, 284, 285, 286, 287–88, 289, 290–91, 292–93, 296, 297, 298, 309, 315–16
  - trading 14, 85, 277, 288, 289, 292, 293, 297, 298
  - vehicle 86
- employment 3, 38, 50, 57, 58, 59, 61, 63, 64, 66, 68, 83, 84, 93, 121, 158, 182, 309, 314, 358
  - agricultural 26, 38, 64, 158, 160, 162, 171, 173, 175, 176
  - manufacturing 27
  - migrant 25, 50, 62, 89–90, 158, 159, 160, 176, 187, 190, 192–93
  - unemployment 38, 50, 56, 59, 62–63, 68, 89, 99, 116, 182, 187, 192–93, 207, 208
  - urban 10, 26–27, 61–62, 158, 159, 207
- energy
  - clean 262, 272, 274, 276, 284, 294
    - biomass 294
    - geothermal 294
    - hydro 262, 294, 295, 318
      - solar 262, 272, 274, 284, 294, 296, 297
      - wind 262, 272, 274, 294
  - consumption 2, 13–14, 15, 79, 86, 91, 252, 253, 255, 257–59, 262, 268, 272, 273, 274, 283, 286, 294, 295, 296, 301, 302, 303, 304, 305, 309, 311, 313, 317, 318, 319
  - efficiency 5, 85–86, 263, 268, 272, 277, 293–94, 295, 304, 305, 318
  - import dependence 15, 319
  - inputs 252, 253, 301
  - market 295–96, 297, 304, 309, 313
  - oil 15, 44, 273, 276, 311, 313, 314, 316, 317–19
    - crisis (1970s) 14, 302, 307–08, 309, 310, 316
  - policy 15, 273, 195, 302, 307, 308, 309, 314, 319
  - policy trilemma 14–15, 301, 302, 307–10, 318–19
  - pricing 8, 14, 44, 45, 48, 83, 84, 85, 86, 94, 118, 305, 307
  - resources 310–318
  - security 13, 273, 274, 307, 309, 310, 314, 315, 317–18
  - supply 15, 85, 118, 297, 301, 302, 304, 310, 315, 318, 319
- Europe 9, 77, 108, 110, 113, 114, 120, 125, 275, 282, 289, 293, 309, 316, 325, 345
- European Union 97, 98, 110, 290, 298
- farming 2, 10, 152, 158, 172
  - diminishing population 26, 158, 274
  - farm workers 28, 38, 83
  - income 156, 160–62, 163, 172, 174, 203
  - intensity 172, 173
  - resumption of land 24–25, 173–74, 175, 206
  - social support 147–48, 168–69, 176, 203
  - welfare 162, 176
- five-year plan 63, 85
  - 10th 168
  - 11th 168, 169

- 12th 5, 7, 14, 57, 63, 66, 168, 273, 293, 295, 296
- 13th 7, 57, 63, 66
- foreign government bonds 108, 112, 114, 118, 119, 120
- France 78, 308, 321
- Fujian Province 129, 157, 225, 226, 227, 228, 244, 306, 327,
- Gansu Province 157, 166, 226, 227, 228, 244
- gas
  - consumption 311, 312
  - fracturing (fracking) 308, 315
  - natural 15, 118, 222, 238, 239, 253, 255, 256, 257, 261, 273, 276, 292, 295, 302, 307, 308, 309, 310, 311, 313, 314, 315, 316–19
  - supply 15, 255, 313
  - shale 274, 276, 313, 314, 315
- General Corporation of Shanghai
  - Municipal Property 213
- Germany 78, 301, 303, 308, 327, 329
- Gini coefficient 7, 40–41
- global economy 9, 98, 101, 118
- Global Financial Crisis 3, 4, 12, 35, 37, 60, 97, 103–07, 110, 112, 113, 117, 179–80, 199, 223, 224, 246, 304, 324
- global financial markets 97, 110
- greenhouse gas emissions 4, 13, 14, 268, 272, 273, 282, 286, 292, 295, 296
- greenhouse gas policy 14
- Guangdong Province 90, 128, 129, 157, 212, 225, 226, 227, 228, 244, 306, 327
- Guizhou Province 129, 157, 225, 226, 227, 228, 244
- Hainan Province 157, 225, 226, 227, 228, 244
- Hebei Province 128, 129, 155, 157, 225, 226, 227, 228, 244
- Heilongjiang Province 155, 157, 225, 226, 227, 228, 244, 327,
- Henan Province 129, 155, 157, 225, 227, 228, 244
- Hong Kong 19, 22, 78, 79, 221, 222, 321, 327, 329, 343
- Independent Commission against Corruption 22
- Hubei Province 129, 155, 157, 225, 227, 228, 244
- Hunan Province 129, 155, 157, 225, 226, 227, 228, 244
- income 3–4, 6, 7, 8, 17, 19, 26, 32, 35, 36, 41, 44–45, 46–47, 48, 50, 51, 67, 75–76, 77, 83, 84, 88, 90, 91, 92–93, 100, 102–03, 125, 199, 210, 243, 267, 275, 283, 306, 315, 316, 318, 343–44
- agricultural and rural 2, 4, 10, 27, 28, 39–40, 152, 156, 158, 160–63, 166, 169, 173–74, 203, 274
- foreign factor income 102
- income safety net 6, 199
- middle-income trap 7, 36, 48, 50, 51, 100
- net factor income 107, 111
- purchasing power 4, 27, 76, 302
- urban 10, 29–30, 39–40, 147–48, 160–62, 274
- tax 200
- India
  - GDP 303
- Indonesia 76, 291, 303, 343
- industrial value added (IVA) 253, 254, 255, 256–57, 258, 259, 260, 261, 262
- industrialisation 8, 46, 75–94, 147, 251, 268, 274, 301, 304, 315
- economic impact 91–93
- ‘green’ growth 12–13, 251–64, 267–78
- history 76–82
- policy 82–91, 262–63, 276–78
- information and communications
  - technology, exports 341–58
- infrastructure 8, 17, 30, 31, 37, 51, 52, 79, 91, 94, 131, 141, 167, 202, 210, 212, 213, 214, 216, 221, 222, 224, 229, 230, 231, 232, 234, 235, 236, 239, 240, 241, 244, 245, 249, 274, 315
- housing 17, 30, 31
- rural 168–69, 174
- transport 17, 37
- urban 5, 91, 213, 301
- Inner Mongolia 129, 155, 157, 164, 166, 225, 227, 228, 244, 306
- intellectual property 9, 49, 50, 126, 132, 136, 138–40, 141, 142, 248

- International Energy Agency 295, 304, 315
- investment, private sector 321–36
- Japan  
 energy 293, 298, 309–10  
 Fukushima 293, 298, 309  
 GDP 79  
 nuclear energy, 309–10  
 saving 9, 113, 120  
 uranium 310
- Jiangsu Province 128, 157, 212, 225, 226, 227, 228, 244, 306, 327
- Jiangxi Province 155, 157, 225, 226, 228, 244
- Jilin Province 155, 157, 225, 227, 228, 244
- Korea 30
- Liaoning Province 155, 157, 225, 227, 228, 244, 306
- logistics 91, 270  
 World Bank Logistics Performance Index (LPI) 210
- local investment corporation (LIC)  
 213–15, 216
- Macao 221, 222
- manufacturing 17, 27, 39, 47, 49, 63, 70, 90, 99, 100, 101, 126, 135, 222, 238, 255, 262, 271, 272, 274, 297, 308, 317, 323, 326, 327, 328, 329, 341  
 export oriented 17, 35, 90, 91, 100, 126, 346
- Mexico 77, 78, 79, 82
- New Zealand 289
- Nanjiang 179
- National Audit Office (NAO) 208, 213, 214, 216
- National Bureau of Statistics (NBS) 40, 41, 47, 62, 135, 179, 327
- National Development and Reform Commission (NDRC) 18, 212, 214, 281
- National Economic Research Institute (NERI) 135, 136
- National People's Congress (NPC) 11, 202, 204, 206, 208, 216
- Netherlands, the 77, 78
- Ningxia Province 129, 157, 166, 225, 226, 227, 228, 244, 306
- North American Free Trade Agreement (NAFTA) 82
- nuclear  
 fuel processing 255, 260  
 power 14–15, 255, 294, 302, 307, 308–09, 310, 318  
 reactors 308, 319
- Obama, Barak 39, 292
- OECD 26, 91, 267, 308, 310
- outward direct investment (ODI) 15, 321–22–36
- Pakistan 19
- Papua New Guinea 19
- Pearl River Delta 189
- Peking University 38
- People's Bank of China (PBC) 39, 87, 108, 119, 214
- petroleum 86, 113, 118, 243, 253, 255, 257, 260, 273
- Philippines 76, 297, 343
- Portugal 297
- productivity, growth in 30–32
- Qinghai Province 129, 157, 166, 222, 225, 226, 227, 228, 244, 306
- Qualified Domestic Institutional Investor (QDII) 86
- Qualified Foreign Institutional Investor (QFII) 86–87
- research and development (R&D) 6, 9–10, 18, 32, 50, 125–42, 243, 292, 329  
 R&D intensity 127–28, 130–31, 132–34, 136, 137, 138–42
- rural–urban migration 8, 10, 18, 25, 26–28, 30, 49, 63, 67–68, 69–70, 75, 83, 90, 147, 158, 173, 175, 179–97  
 education 195–96  
 hukuo  
 population 10, 180–87, 195, 196  
 system 8, 18, 26, 27, 67–68, 83, 90, 94  
 mental health 11, 188–89, 197

- migrant labour 2, 10–11, 27, 38, 49, 50, 52, 61, 62, 63, 67–68, 69–70, 75, 83, 85, 89–90, 158, 175, 176, 181, 182, 184–86, 187–93, 194, 196
- wages 45, 55, 88, 187, 189–92, 194, 196
- Russia 303, 343
- Shaanxi Province 128, 157, 225, 226, 227, 228, 244
- Shandong Province 128, 155, 157, 212, 225, 226, 227, 228, 244, 306, 327
- Shanghai 179, 213, 304, 306
- Shanghai Province 128, 157, 179, 225, 226, 227, 244, 327
- Shanxi Province 157, 225, 226, 227, 228, 244,
- Sichuan Province 155, 157, 166, 225, 227, 228, 244
- Singapore 19, 22, 71, 78, 79, 216, 343
- Slovenia 326
- social insurance 192, 204, 208
- social insurance fund (SIF) 204, 207–09
- social safety net 25, 30, 83, 199
- social welfare 6, 10, 18, 28, 47, 179, 192–93, 194, 196, 238
- State Council 12, 75, 88, 90, 92, 125, 207, 212, 215, 273, 294, 295
- State-owned Assets Supervision and Administration Commission (SASAC) 207
- Development Research Centre 12
- sterilisation bonds 108
- South Africa 343
- South Korea 32, 46–7, 78, 79, 82, 90, 127, 303
- State Grid Corporation 297
- State Nuclear Power Technology Company (SNPTC) 308
- State-owned Assets and Administration Commission (SASAC) 207
- Taiwan 27, 46–7, 78, 79, 221, 222, 303, 343
- taxation 229
  - carbon tax 14, 288
  - corporate 36, 44, 200, 221, 222, 225, 229, 230, 231, 232, 234, 235, 236, 239, 240, 241, 243, 244, 246, 248, 277
  - customs 19
  - export 296, 314, 346
  - household 36, 44
  - income 19, 200
  - land 26, 200
  - reform 90, 92, 105, 160, 163, 199, 200–02, 203, 230, 243, 246, 276, 277, 314
  - revenue 105, 204–05, 206, 208–09
  - resource taxes 14, 85, 86, 314
  - system reform 201
- Three Gorges Dam fund 206, 212
- Tianjin Province 128, 129, 157, 208, 225, 226, 227, 228, 244, 306
- Tibet 129, 157, 166, 222, 244
- Toshiba Westinghouse 308
- total factor productivity (TFP) 7–8, 12, 30, 56, 57, 58–59, 63–64, 68–70, 71, 155–56, 251–52, 254, 257, 258, 259–61, 324, 326, 330, 341
  - green TFP (GTFP) 12, 253, 254, 257–58, 259–61, 262, 263–64
- Turkey 77, 78, 79
- United Arab Emirates 327, 329
- United Kingdom 78, 301, 303, 304, 321
- United Nations Framework Convention on Climate Change 4, 14, 285
  - Bali 285
  - Cancun 285, 287, 290–91, 292, 293
  - Copenhagen 4, 285, 287, 289, 291
  - Durban 285, 287, 288
  - Doha 285, 287
  - Kyoto Protocol 285, 286, 287, 288, 291
  - Rio de Janeiro 285, 286
- United States 4, 8, 9, 28, 30, 70, 78, 91, 91, 97, 98, 98, 108, 109, 110, 112, 113, 114, 114, 116–17, 118, 119, 120, 125, 127, 132, 174, 210, 267, 275, 285, 287, 290, 292, 298, 301, 303, 304, 308–09, 313–15, 316, 317, 321, 324, 326, 327, 329
- debt 110, 116
- energy 15, 98, 118, 120, 292
- oil & gas 15, 302, 307, 308–09, 316
- University of New South Wales 297
- uranium 15, 302, 310, 319
- urban development investment corporation (UDIC) 213

- urbanisation 26–30
- World Bank 12, 19, 37, 48, 91, 201, 251, 262
  - Logistics Performance Index 91, 210
- World Health Organisation 251
- world financial crisis, 1997–1998 17
- Yangzi River Delta 189
- Xinjiang Province 157, 166, 174, 225, 226, 228, 244
- Yi Gang 39, 87
- Yunnan Province 157, 166, 225, 226, 227, 228, 244
- Zambia 19
- Zhejiang Province 15, 128, 157, 212, 225, 226, 227, 228, 244, 306, 322, 327, 327