

Business confidence of manufacturing industry marked a record high

- Domestic economy improved for five consecutive months -

(Companies researched: 23,235 ; Valid responses: 10,214; Response rate: 44.0%;
Survey start date: May 2002)

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< Overview of October 2017: Recovery continues >

The economic diffusion index (DI) in October 2017 was 49.1, up 0.7 points from the previous month, and an improvement for five consecutive months. "Manufacturing" improved for nine consecutive months and marked a record high. The domestic economy continued to recover, driven by the manufacturing industry that marked a record high with strong export and active construction investment, etc.

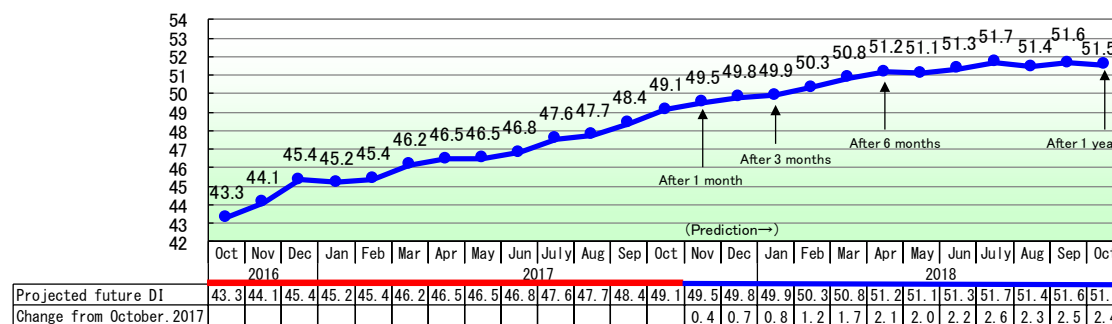
< Future outlook: Recovery trend continues >

The recovery trend in the domestic economy is expected to continue, with anticipation of a recovery in domestic demand led by foreign demand.

By industry : "Manufacturing" improved for nine consecutive months, and marked a record high.

By size : The economy hit a new high after an increase in the consumption tax rate in all sizes for four consecutive months.

By region : The economy improved in seven of the ten regions. "Kyushu" recovered to the DI level of over 50 for the first time in three years and seven months.



*: Economic DIs are calculated based on the structural ARIMA model, in which economic statistics are incorporated to the ARIMA model.

Economic Diffusion Index (Economic DI)1/2

	Oct-16	Nov-16	Dec-16	Jan-17	Feb-17	Mar-17	Apr-17	May-17	Jun-17	Jul-17	Aug-17	Sep-17	Oct-17	Ratio to the PrFDious Month
Total	43.3	44.1	45.4	45.2	45.4	46.2	46.5	46.5	46.8	47.6	47.7	48.4	49.1	0.7
Large Firms	46.5	47.0	48.4	48.2	48.3	48.9	49.4	49.9	49.8	50.3	50.5	51.3	51.6	0.3
Small to Medium-sized Firms	42.4	43.3	44.5	44.4	44.6	45.4	45.7	45.6	46.0	46.8	47.0	47.7	48.5	0.8
Micro Firms	41.9	42.9	43.9	43.5	44.1	44.4	44.5	44.4	44.4	45.6	45.7	46.7	47.6	0.9

	Oct-16	Nov-16	Dec-16	Jan-17	Feb-17	Mar-17	Apr-17	May-17	Jun-17	Jul-17	Aug-17	Sep-17	Oct-17	Ratio to the PrFDious Month
Agriculture,Forestry,Fisheries	41.2	44.6	47.3	43.3	45.1	45.5	47.0	45.4	45.3	44.9	44.5	45.6	47.5	1.9
Finance	44.1	45.2	45.9	46.4	45.5	45.6	46.0	46.4	46.3	47.2	46.8	48.0	47.9	▲ 0.1
Construction	48.6	49.2	49.7	49.2	49.5	49.3	49.0	49.5	49.5	50.4	50.7	51.7	52.7	1.0
Real Estate	46.2	47.7	48.7	49.3	49.9	49.4	49.7	50.7	49.4	49.6	49.3	49.9	50.9	1.0
Manufacturing	Food,BEWerages,Livestock Feed	42.2	42.2	43.4	41.9	42.1	42.7	43.0	42.6	43.5	42.9	43.0	42.8	▲ 0.2
	Textile,Textile Products,Clothing	36.6	36.7	38.0	36.3	37.7	38.6	38.8	39.4	37.8	37.9	38.4	37.7	0.9
	Construction Materials,Furniture, Ceramics,Stone and Clay Products	41.7	42.5	43.5	43.3	42.8	43.2	42.4	43.4	43.4	45.3	45.9	45.6	1.4
	Pulp, Paper and Paper Products	40.1	40.3	43.0	43.3	42.0	42.0	42.9	42.5	43.4	43.8	41.9	44.4	2.2
	Publishing,Printing	34.4	35.0	35.7	33.9	34.6	36.5	35.6	33.4	35.1	34.2	34.6	35.7	▲ 0.7
	Chemical	43.8	45.5	48.2	47.5	47.9	48.5	49.9	50.3	50.2	51.4	50.5	51.8	0.7
	Steel,Nonferrous Metals,Mining	42.5	44.3	45.7	45.9	46.2	47.0	47.5	47.3	49.6	51.1	51.6	53.0	1.3
	General Machinery	46.7	47.9	50.3	49.9	51.1	52.9	54.1	54.5	54.8	56.5	56.2	57.2	2.1
	Electrical Machinery	44.5	44.4	45.5	46.3	47.1	47.8	48.6	49.3	49.7	50.3	51.5	52.2	1.5
	Transportation Machinery,Equipment	46.9	46.6	48.6	49.5	49.3	52.5	50.3	52.0	52.7	52.2	54.7	54.8	▲ 0.6
	Precision Machinery, Medical Instruments and Equipment	44.0	44.8	46.3	46.7	49.4	48.1	50.0	51.7	51.5	50.4	51.8	51.5	1.7
	Other	37.3	39.4	39.6	39.2	41.3	41.3	40.1	38.2	38.5	40.3	39.7	41.6	▲ 2.0
	Total	42.7	43.5	45.2	44.8	45.4	46.3	46.7	46.9	47.5	48.5	48.6	49.4	0.9
Wholesale	Food,BEWerages	39.9	40.1	41.5	40.6	40.4	41.0	41.7	42.7	41.8	42.2	41.3	41.1	▲ 0.5
	Textile,Textile Products,Clothing	31.9	33.1	34.0	33.7	33.4	32.6	34.7	34.5	35.0	34.3	34.2	35.3	0.1
	Construction Materials, Furniture,Ceramics, Stone and Clay Products	40.3	42.6	43.2	42.1	42.6	42.8	41.8	43.2	42.8	43.0	43.8	44.0	0.2
	Paper Products,Stationery,Books	36.1	37.5	37.7	38.6	38.4	38.3	38.5	36.1	38.4	37.4	35.7	38.8	▲ 0.4
	Chemical	40.9	40.4	43.1	44.4	42.8	44.5	46.0	45.1	45.3	46.5	47.2	47.5	0.6
	Recycled Resources	36.9	44.0	49.5	49.1	50.0	54.9	49.5	49.0	51.8	49.5	55.4	52.4	▲ 0.8
	Steel,Nonferrous Metals, Mining Products	36.8	39.6	42.6	42.5	42.9	44.0	43.5	41.3	43.1	45.1	45.6	46.2	3.3
	Machinery,Equipment	41.6	42.5	44.2	44.8	44.3	45.8	46.3	46.1	46.6	48.0	48.2	48.5	0.8
	Other	37.6	37.9	39.9	40.1	39.2	39.9	41.1	42.0	41.4	42.1	41.3	42.0	0.0
	Total	39.3	40.4	42.1	42.2	41.8	42.8	43.2	43.1	43.4	44.2	44.3	44.8	0.7

Economic Diffusion Index (Economic DI)2/2

		Oct-16	Nov-16	Dec-16	Jan-17	Feb-17	Mar-17	Apr-17	May-17	Jun-17	Jul-17	Aug-17	Sep-17	Oct-17	Ratio to the PrFDious Month
Retail	Food,BEWerages	37.6	37.7	40.6	37.4	41.5	41.4	39.0	39.9	42.9	41.1	44.3	44.4	42.1	▲ 2.3
	Textile,Textile Products,Clothing	27.6	32.4	31.3	32.7	29.0	30.9	31.8	33.9	34.4	34.6	35.1	34.4	37.5	3.1
	Drugs,Sundries	38.3	41.1	42.0	43.5	46.0	44.3	46.0	46.4	44.4	43.8	46.8	44.2	44.9	0.7
	Furniture	37.5	37.5	30.0	33.3	38.1	33.3	35.7	35.7	40.7	39.6	37.5	41.7	40.9	▲ 0.8
	Electrical Household Appliances, Information Machinery and Equipment	41.2	37.8	38.6	40.5	39.9	43.0	41.7	38.1	41.9	41.7	44.6	40.2	43.9	3.7
	Motor Vehicles,Motor Vehicle Parts	39.3	40.2	41.0	43.5	46.3	47.7	41.9	41.5	44.4	44.4	45.5	46.2	45.3	▲ 0.9
	Special Merchandise	36.5	36.3	37.1	38.3	39.1	38.8	38.3	39.1	39.8	39.7	39.8	39.7	39.6	▲ 0.1
	Various Merchandise	41.7	44.4	44.6	42.0	45.3	44.6	44.3	45.0	48.7	46.5	45.8	45.7	46.3	0.6
	Other	46.7	46.7	46.7	45.8	45.8	40.0	40.0	41.7	41.7	38.9	44.4	46.7	46.7	0.0
	Total	37.5	38.3	39.1	39.4	40.9	41.1	39.8	40.2	42.1	41.5	42.7	42.2	42.4	0.2
Transportation,Warehousing		44.0	44.4	46.1	45.0	43.8	45.6	47.0	46.8	45.7	47.7	48.4	49.0	49.9	0.9
Service	Restaurants	37.0	38.0	37.5	42.3	39.0	45.1	45.0	41.1	43.0	43.9	41.9	45.2	45.1	▲ 0.1
	Postal,Telecommunications	53.7	57.7	46.2	55.1	52.8	58.3	54.2	51.3	56.9	55.6	54.2	59.1	54.5	▲ 4.6
	Electricity,Gas,Water,Heat	43.3	50.0	41.7	50.0	52.4	47.2	52.4	52.4	57.1	52.4	52.8	57.1	58.3	1.2
	Leasing,Rentals	49.0	49.3	48.9	47.9	48.2	50.1	48.9	50.2	50.0	50.6	49.7	52.0	54.2	2.2
	Lodging, Hotels	49.4	44.3	47.5	43.5	45.6	49.4	48.9	49.4	47.9	46.9	47.4	41.7	43.6	1.9
	Recreation	37.8	37.0	36.9	37.7	37.1	39.2	39.1	40.9	40.8	40.1	38.3	40.0	39.1	▲ 0.9
	Broadcasting	47.9	50.0	49.0	45.6	47.8	47.8	47.8	46.7	42.9	46.2	47.2	47.2	46.2	▲ 1.0
	Maintenance,Guarding,Testing	47.0	48.2	47.1	47.4	47.8	48.6	49.4	48.9	49.7	50.2	51.4	51.3	50.3	▲ 1.0
	Advertising	39.8	38.9	40.9	38.6	39.8	41.0	42.3	41.8	40.6	41.0	41.9	40.5	43.6	3.1
	Information	52.3	52.7	53.2	54.3	54.8	55.3	56.1	55.6	55.7	56.6	56.1	57.2	57.9	0.7
	Labor Dispatching	52.5	51.4	54.4	54.4	50.8	54.6	55.8	52.3	54.8	54.8	58.6	57.5	58.2	0.7
	Special Services	50.8	50.3	52.8	51.9	51.8	52.6	53.2	52.3	52.3	52.6	53.4	53.2	53.3	0.1
	Medical,Welfare,Public Health	43.5	43.6	44.0	43.6	44.7	46.4	47.7	47.9	48.3	45.2	46.1	47.4	44.1	▲ 3.3
	Education	45.6	43.1	43.7	46.7	44.4	43.7	41.1	43.5	42.1	42.5	42.5	41.7	41.0	▲ 0.7
	Other	47.4	47.9	47.9	47.1	49.6	50.1	50.0	49.3	50.8	50.2	50.5	50.7	50.6	▲ 0.1
	Total	48.1	48.2	48.7	48.8	49.1	50.4	50.9	50.4	50.7	50.9	51.1	51.5	51.8	0.3
Other		41.5	38.6	39.5	39.9	40.8	40.2	42.1	41.7	42.2	41.7	42.4	43.6	43.3	▲ 0.3

	Oct-16	Nov-16	Dec-16	Jan-17	Feb-17	Mar-17	Apr-17	May-17	Jun-17	Jul-17	Aug-17	Sep-17	Oct-17	Ratio to the PrFDious Month
Hokkaido	42.1	42.5	42.6	42.2	43.2	43.9	44.3	46.1	45.7	48.4	48.8	48.6	48.6	0.0
Tohoku	44.7	44.8	44.6	44.2	43.6	44.7	45.2	45.4	45.4	45.7	45.4	45.9	45.9	0.0
kitakanto	42.3	43.3	45.0	44.9	44.2	45.4	46.6	46.4	47.0	48.3	47.8	49.1	50.2	1.1
minamikanto	44.0	45.0	46.1	46.3	46.5	47.1	47.4	47.3	47.7	48.2	48.2	49.1	49.7	0.6
Hokuriku	40.1	41.8	43.0	43.4	42.8	44.1	44.3	45.3	45.9	47.5	48.0	48.8	49.3	0.5
Tokai	43.6	44.2	46.4	45.7	45.9	46.6	46.8	46.4	47.3	48.1	48.8	49.2	50.0	0.8
Kinki	41.6	42.4	43.7	43.7	44.1	45.1	45.2	44.7	44.9	45.6	46.1	46.7	48.0	1.3
Chugoku	43.6	43.9	45.8	44.6	45.1	46.3	46.1	46.0	46.5	47.0	47.7	47.8	48.6	0.8
Shikoku	45.1	45.8	47.2	46.2	46.5	46.1	46.9	46.8	47.0	47.0	46.8	48.5	48.2	▲ 0.3
Kyushu	45.6	46.7	48.0	48.1	49.0	48.7	49.1	49.5	48.9	49.4	49.4	49.9	50.5	0.6

Appendix

1. Research Subjects (Companies Researched 23,235; Valid responses: 10,214 ; Response rate: 44.0%)

Appendix

1. Region

Hokkaido	516	Tokai	1,131
Tohoku	641	Kinki	1,732
kitaKanto	715	Chugoku	574
minamikanto	3,295	Shikoku	310
Hokuriku	562	Kyushu	738
		Total	10,214

2. Industry (10 Industries 51 Lines of business)

Agriculture, Forestry, Fisheries		54
Finance		129
Construction		1,476
Real Estate		313
Manufacturing 3,223	Food, Beverages, Livestock Feed	324
	Textile, Textile Products, Clothing	117
	Construction Materials, Furniture, Ceramics, Stone and Clay Products	236
	Pulp, Paper and Paper Products	112
	Publishing, Printing	188
	Chemical	408
	Steel, Nonferrous Metals, Mining	505
	General Machinery	451
	Electrical Machinery	335
	Transportation Machinery, Equipment	102
	Precision Machinery, Medical Instruments and Equipment	72
	Others	85
Wholesale 3,959	Food, Beverages	356
	Textile, Textile Products, Clothing	185
	Construction Materials, Furniture, Ceramics, Stone and Clay Products	340
	Paper Products, Stationery, Books	101
	Chemical	281
	Recycled Resources	32
	Steel, Nonferrous Metals, Mining Products	312
	Machinery, Equipment	913
	Others	347

3. Size

Large Firms	2,127	20.8%
Small to Medium-sized Firms	8,087	79.2%
micro Firms	2,636	25.8%
Total	10,214	100.0%

Retail 480	Food, Beverages	65
	Textile, Textile Products, Clothing	28
	Drugs, Sundries	26
	Furniture	11
	Electrical Household Appliances, Information Machinery and Equipment	41
	Motor Vehicles, Motor Vehicle Parts	68
	Special Merchandise	131
	Various Merchandise	49
	Others	5
Transportation, Warehousing		447
Service 1,384	Restaurants	41
	Telecommunications	11
	Electricity, Gas, Water, Heat	8
	Leasing, Rentals	103
	Lodging, Hotels	26
	Recreation	58
	Broadcasting	13
	Maintenance, Guarding, Testing	161
	Advertising	107
	Information	435
	Labor Dispatching	51
	Special Services	238
	Medical, Welfare, Public Health	99
	Education	24
	Others	144
Others		50
Total		10,214

2. Research Items

- *Business Confidence (current, in 3 months, in 6 months, in 1 year)
- *Business Conditions (sales, purchasing and selling unit price, inventory, capacity utilization ratio, number of employees, overtime work hours)

3. Research Period and Methodology

Internet-based survey conducted October 18 – 31 2017

The explanation of the Economic Diffusion Index

Research Purpose/Researched Terms

TDB Economic Trend Research (started from May 2002) is a monthly statistical survey conducted for over 20,000 nationwide corporations on their general business activities including the current condition and future outlook of the industry business performance and operating climate. The primary purpose of such a survey is to assess the current state of Japan's economy.

Selection of the Subject Corporations

Companies of all sizes in all domestic industries are eligible to participate in the survey.

DI Formula

The DI (Diffusion Index) is calculated by attaching a number (in parenthesis in the diagram below) to each of seven possible responses. Then multiplying the percentage of each response by the appropriate number, and adding the results.

Very Bad	Bad	Moderately Bad	Neither Good or Bad	Moderately Good	Good	Very Good
(0)	(1/6)	(2/6)	(3/6)	(4/6)	(5/6)	(6/6)
0	16.7	33.3	DI=50 Dividing point	66.7	83.3	100

A DI over 50 is in the range of “Good.” A score under 50 is “Bad.” The number 50 is the dividing point (“Neither Good or Bad”). All numbers are rounded off to the hundredth. It should be noted that no weight is given to a company's responses based on its size. Calculations are made according to a “one company, one vote” rule.

For example, all corporations rated ‘Very Good’.

$$DI=6/6 \times 100(\%)=100$$

All corporations rated ‘Neither Good nor Bad’.

$$DI=3/6 \times 100(\%)=50$$

Size Classification

Industry	Large Firms	Small to Medium-Sized Firms (Micro Firms included)	Micro Firms
Manufacturing and Other Industries*	Capital: More than 300 million yen and No. of Employee: Over 300	Capital: Below 300 million yen or No. of Employee: Below 300	No. of Employee: Below 20
Wholesale Trade	Capital: More than 100 million yen and No. of Employee: Over 100	Capital: Below 100 million yen or No. of Employee: Below 100	No. of Employee: Below 5
Retail Trade	Capital: More than 50 million yen and No. of Employee: Over 50	Capital: Below 50 million yen or No. of Employee: Below 50	No. of Employee: Below 5
Service**	Capital: More than 50 million yen and No. of Employee: Over 100	Capital: Below 50 million yen or No. of Employee: Below 100	No. of Employee: Below 5

Note1: Large Firms refer to companies that rank in the top 3% in terms of sales volume according to the type of business, among small to medium-sized corporations excluding micro firms, which are defined in Small and Medium Enterprises Basic Act.

Note2: Small to Medium-Sized Firms refer to companies that rank in the bottom 50% in terms of sales volume according to the type of business, among those not categorized as small to medium-sized corporations in Small to Medium-Sized Enterprises Basic Act.