

(JIT)

*

(JIT)

(JIT)

40

(JIT)

SPSS

(JIT)

(JIT)

.1

(JIT)

(Just-In-Time)

(1960 - 1950)

(Ian Cobb, 1992)

Ford

)

(84 2004

2006/2/11

2006/8/29

*

(JIT)

-4

(JIT)

(JIT)

:

:

(JIT)

.

:

(JIT)

JIT

:

:

(JIT)

(JIT)

-1

.

:

(JIT)

(JIT)

-2

)

(JIT)

-3

.(

-4

(JIT)

88

.2

49

40

:

.3

-1

(1987) Foster And Horngren

.1

(JIT)

"

-2

"

(JIT)

-3

:		أ.		:	-
		ب.			-
		ج.			-
"	(1993)	.5		"	-
	(JIT)			(1987) (Mchilhattan)	.2
				()	
				"	(1993) (Deluzio)
				"	.3
"	(1998)	.6			
	.(JIT)				
		(JIT)			-
				()	-
:		.JIT			-
					-
		(JIT)			-
				"	(2002) Small and others
				"	.4
"	(1999)	.7			
	(JIT)				

(2003)

(1999)

(JIT)

(Schonberger, 1992, 16)

.4

(JIT) Just-In-Time

(Cobb: 1992,42)

(Sadhawni and others, 1985, 36)

(399 :1994

(Stevenson, " ...

2002)

.(Clinton and Ko-Cheng, 1997, pp.18-24) JIT

(Schroeder, 1989, 487)

(JIT)

"

- - -)

(

()

(JIT)

(1998)

:2002)

.(106

.(Hay, 1998)

JIT

(Mathew, 2005)

(JIT)

JIT

(Schonberger

and Knod, 2001) (Krajewski and Ritzman, 1996)

(Stevenson, 2002)

JIT

(McWatters, 2002)

()

JIT

(JIT)

:(1)

JIT

.(1999

.(Bright and others, 1992)

.(ZipKin, 1991)

(Pull System)

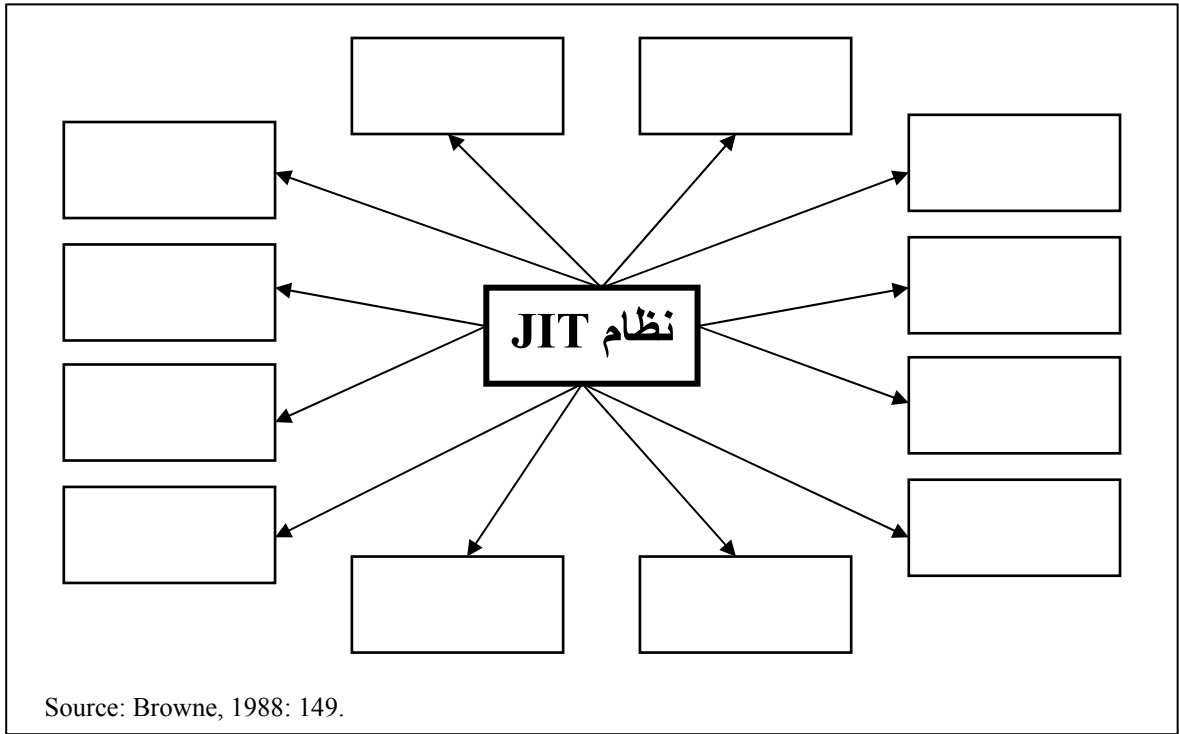
:Kanban (*)

(Clinton and Ko-Cheng,

1997) (www.maaw.info/JITsum, 2005) (Fullerton, 2002)

:(Mathew, 2005)

Michael Robert and Bernard Racine, 2001. E-Strategy Pure and Samples, McGraw-Hill.



(JIT) : (1)

(1)

: -1

(Stable
.(www.maaw.info/JITsum, 2005)

.(Multiple Spindles)
Production Schedule)

: -2

(U)

.(Daft, 2001)

%15 -

(JIT)

%25 -

%60 -

(Hay, 1998)

: -3

:() -7

(Kanban)

(Robert and Racine, 2001)

: : -4

:

:

(1996) .

(Robert and Racine, 2001), (Grosby,

:1984)

.(1996)

-5

+

+

:

.(Schonberger, 1992)

-1

: -6

-2
-3
-4
-5
-6

(%30-%20)
(1998)

-2
-3
-4

%40
%50

(Jack:1992)
JIT -5

(Fullarton, 2003)

-
-
-
-1

-
 - Omark %35 Xerox
 .(Inman, 1992) %10
 - (JIT)
 %78 %50
 - %67-%40
 .%78-%30
 %57
 - %50 %40
 (JIT) (Dilworth, 1989) %90
 .(Ansari, 1986) (Lee, 1989)
 (JIT) (Fouad, 1991)
 :

%	%	
69	50	-1
35.7	16.7	-2
69.7	50	-3
50	33.3	-4
28.6	16.7	-5
71.4	50	-6
35.7	33.3	-7
57.4	-	-8
14.3	66.7	-9
21.9	33.3	-10

(Inman,

.1992)

.5

%86.25 α

(JIT)

%60

.(1999) %33

(sig) α

0.05

:

:

(JIT)

(JIT)

:

(1)
JIT

1,3183	3,1750	JIT	.1
1,1447	3,6500	JIT	.2
1,3471	3,0750	JIT	.3
1,6075	3,0750	JIT	.4
1,4569	3,3250	JIT	.5
0,7299	4,3250	JIT	.6
1,3550	2,1000	JIT	.7
1,4242	1,8500	JIT	.8
1,3117	2,1500	JIT	.9

(2)

		T/δ	T	T
2.9694		0.78	2.02-	0.282 -

(1)

JIT

(3.1750) (1) - (1) -
 .(1.3183) JIT
 (4.3250) (3,6500) (6 2)
 (1.1447)
 (0.7299)
 (5 4 3)
 (3.0750)
 (3.3250) (3.0750)
 (1.4569) (1.6075) (1.3471)

(3)

(JIT)

0.92681	3.7500	JIT	.1
1.09749	3.9750	JIT	.2
1.46410	3.4000	JIT	.3
1.09895	4.1500	JIT	.4
1.59406	3.3500	JIT	.5
0.93336	4.2750	JIT	.6
0.98189	4.1000	JIT	.7
1.25167	3.1500	JIT	.8
0.82275	4.3000	JIT	.9
0.94428	4.0750	JIT ()	.10
1.04237	3.8750	JIT	.11

(1.3117) JIT

(2)

One Sample T Test :

T

T

(8 7)

(2.02-)

T

(0.282-)

(1.8500) (2.1000)

:

(1.4242) (1.3550)

T

T

JIT

(9)

(2.1500)

(4)

	T/δ	T	T
	0.000	2.02	12.533

One Sample T test

= T (4) (H0) : 12.533 (H0) (JIT) *

(JIT) (3)

(JIT) * JIT (5 4 3 2 1)

(4.150) (3.350)
(1.5940) (0.92681)

(5)

(2 1) (JIT) (6) (4.2750) (0.93336)

(3.9750) (3.750)
(1.09749) (0.92681) (1) (10)
(16 15 14 13 12)

(0.84732) (4.1500) (3.550) (7) (4.100) (0.98189)
(1.80120)

(5 4) (2.4250) (4.1500) (4.300) (3.150)
(1.31826) (1.09895) (1.25167) (0.82275)

(11) (1.04237) (3.8750)

()

(5)

0.92681	3.7500	JIT	.1
1.09749	3.9750	JIT	.2
1.49336	2.9750	JIT	.3
1.09895	4.1500		.4
1.31826	2.4250		.5
0.93336	4.2750		.6
		.JIT	
0.98189	4.1000		.7
1.25167	3.1500		.8
0.82275	4.3000		.9
0.94428	4.0750		.10
		.JIT	
1.04237	3.8750		.11
		.JIT	
1.03651	3.5500	JIT	.12
1.08012	3.7500	JIT	.13
0.84732	4.0000	JIT	.14
0.9782	3.3470	JIT	.15
0.89299	4.1500	JIT	.16
0.52563	4.3250	JIT	.17

(6)

		T/δ	T	T
2.72		0.00	2.02	9.7

(7)

JIT

1.16685	3.6500		JIT	.1
1.05125	3.8500		JIT	.2
0.97534	3.8500		JIT	.3
0.69982	4.1500		JIT	.4
0.63599	4.1750		JIT	.5
0.97534	3.3500		JIT	.6
1.04237	3.8750		JIT	.7
1.05733	3.9000		JIT	.8
0.90014	4.1000		JIT	.9
0.60764	4.3000		JIT	.10
1.07537	3.8500		JIT	.11
1.13199	3.2750		JIT	.12
1.12973	3.8250		JIT	.13
0.98580	4.0500		JIT	.14
0.80224	4.3500		JIT	.15
1.37281	3.2500		JIT	.16
0.82275	4.2000		JIT	.17
1.00989	4.1750		JIT	.18
0.78446	4.5000		JIT	.19
1.43133	3.5500		JIT	.20
0.75064	4.4750		JIT	.21

(8)

		T/δ	T	T
3.9489		0.000	2.227	14.164

(7)

(JIT)

(7)

(9 8 7)

(4.300) (3.150) (4.100)
(0.82275) (1.25167) (0.98189)

(17)

(0.52563) (4.325)

(JIT)

(4.2750) (6)
(0.93336)

(3)

(2.9750)

(1.49336)

(8)

(3)

:

One Sample T Test

(8)

14.164 =

H₀

:

One Sample T Test

T

2.02

(5)

T

(6)

9.7

:

T

H₀

T

H₀

T

T

H_A

H_A

H₀

:
(JIT)

)

:

(JIT)

*

(JIT)

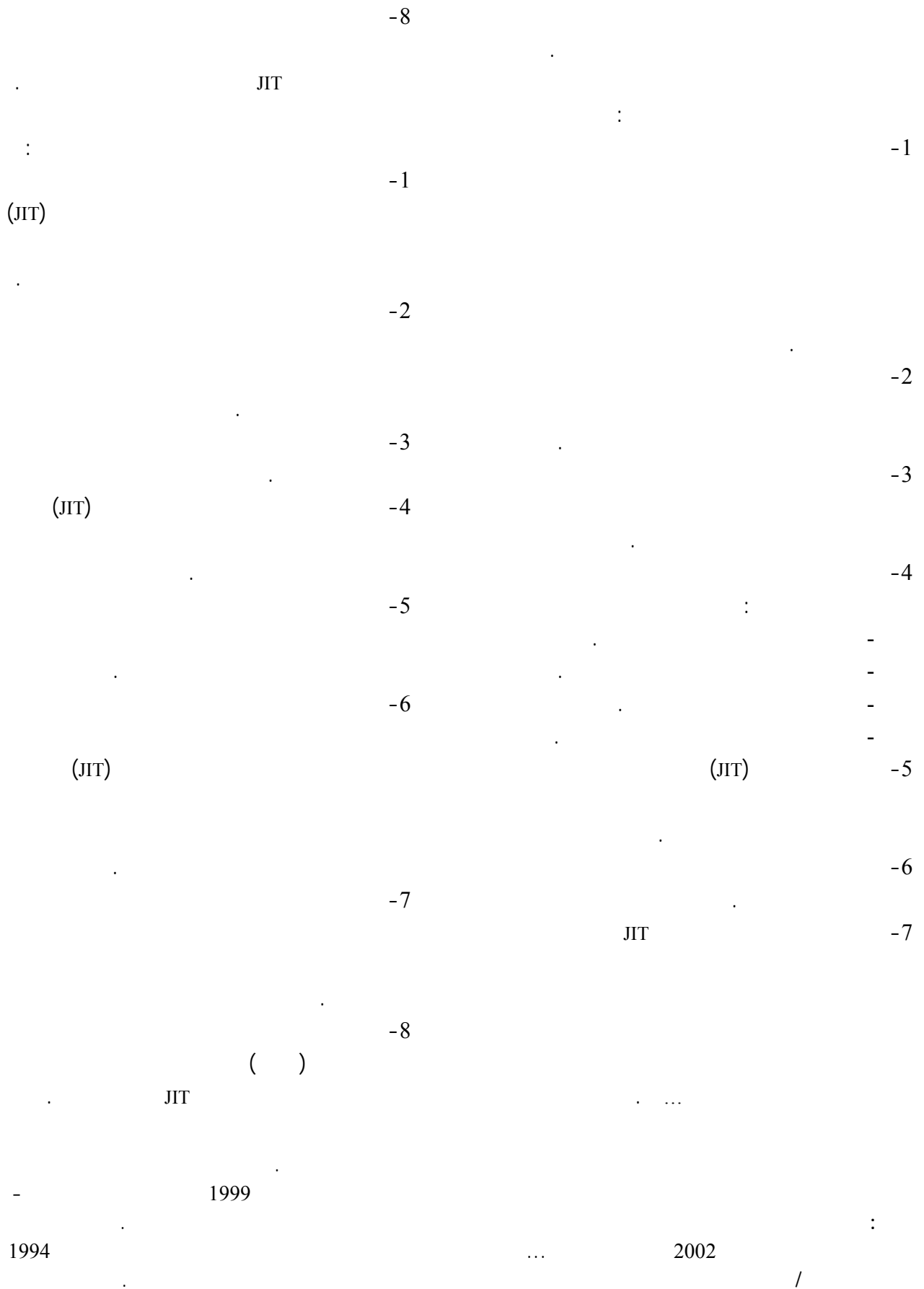
.(

)

.6

.(

(JIT)



Periodicals:

- Ansari, A. and Modarress, B. 1986. Just In Time Purchasing Problems and Solutions, *Journal of Purchasing and Materials Management*, No22.
- Bright, J. et al. 1992. *The Deployment of Costing Techniques and Practices: A UK Study*, *Management Accounting Research*, 3.
- Clinton, B.D. and Ko-Cheng, H. 1997. JIT and the Balanced Score Card Linking Manufacturing Control to Management Control, *Management Accounting*, 18-24.
- Cobb, Ian. 1992. *JIT and the Management Accounting*, *Management Accounting*, London.
- Daveport, H., Thomas and Gloser, J. 2002. *Just In Time Delivery come to Knowledge Management*, HBR, 80 (7).
- Deluzio. M.C. 1993. Management Accounting in a JIT Environment, *Journal of Cost Management*.
- Foster, G. and Horngren, C.T. 1987. Cost Accounting and Cost Management in a JIT Environment, *Journal of Management Accounting*.
- Fullerton, R.R. and McWatters, C.S. 2003. The Role of Performance Measures and Incentive Systems in Relation to the Degree of JIT, Implementation, Accounting, *Organizations and Society*, 27 (8).
- Fullerton, R.R. 2004. *Performance Measurement and Reward System in JIT and Non-JIT Firms Cost Management*, 40-47, University of South Florida.
- Grosby. L.B. 1984. *The Just In Time Manufacturing Process: Control of Quality and Quantity*– Production and Inventory Management – 4th quarter.
- Inman, R.A. 1992. Financial Justification of JIT Implementation, *International Journal of Operations and Production Management*, 13 (4).
- Jack, C. Bails and Ilenek, Kleinsorge. 1992. Cutting Waste with JIT, *Management Accounting*, New York.
- Lee, M.S. 1989. Implementation of JIT System in US Manufacturing Firms, *Operation Management*, 9 (1).
- Mchilhattan, R.D. 1987. How Cost Management Systems can Support the JIT Philosophy, *Journal of Management Accounting*.
- Paul, H. Zipkin. 1991. *Does Manufacturing need a JIT Revolution?*, Harvard Business Review.
- Richard, C. Walleigh. 1986. *What's your excuse for not*
- 2004
- 1996
- (JIT)
- .48
- 1993
- (JIT)
- .4 17
- 1999
- (JIT)
- .10
- 1998
- (JIT)
- .19 53
- 1996
- 2003
- 93 " JIT

Books:

- Browne, J. 1988. *Production Management System*, Addison Wesley Publishing, London.
- Dilworth, J.B. 1989. *Production and Operation Management*, McGraw-Hill Publishing Company, New York,
- Hay, E.J. 1998. *The Just In Time Break Through*, New York: John and Sons.
- Krajewski, J. and Ritzman, B. 1996. *Operation Management and Strategy and Analysis*, Addison Wesley Publishing, Co. Reading Massachusetts.
- Michael, Robert and Bernard, Racine. 2001. *E-Strategy Pure and Samples*, McGraw-Hill.
- Richard, L. Daft. 2001. *Organizations*, South Western-Australia.
- Schonberger, Richard, J. and Knod, E.M. 2001. *Operation Management*, McGraw Hill, Boston.
- Schonberger, Richard, J. 1992. *Japanese Manufacturing Techniques*, New York, Macmillan Publishing Co.
- Schroeder, R.G. 1989. *Operations Management*, New York, McGraw-Hill Book Co.
- Stevenson, W.J. 2002. *Productions and Operation Management*, Irwin, Homewood Publishers.

Websites:

- Anderson, Mathew. 2005: www.justintime.com/home.html.
- www.maaw.info/JITsum,chapter,8, Just-In-Time Systems Attitude and Practice Element., 2005.
- Small, D. et al. 2002. Applying Just In Time System In Government Sector, www.justintime.com/home.html.
- using JIT?* Harvard Business Review.
- Sadhawni, Arjan et al. 1985. Just In Time and Inventory Whose Time Have Come, *Management Accounting*, New York.

Theses:

- Fouad, R.H. 1991. *Status and Structure of JIT Production Planning Systems*, Ph.D., University of Bradford.

The Effect of Applying Just-In-Time Production System on the Production Performance in the Jordanian Manufacturing Companies

*Ghassan F. Al-matarneh and Sulieman H. Al-Beshtawi**

ABSTRACT

This study is mainly concerned with identifying the effect of the implementation of the Just-In-Time manufacturing cost on the production performance of the Jordanian manufacturing companies, and above all, on reducing the production cost. Furthermore, it aims at finding out the obstacles hindering the application of this system in the Jordanian manufacturing companies.

This study is divided into two parts: studying the concept, objectives and the requirements of the Just-In-Time system, the advantages achieved by this system, its effect on the production performance and clarifying shortcomings related to the application of this system. These are what the first part focuses on. The second part is concerned with studying the sample of this study, which consists of 40 companies. SPSS is used to analyze the results of this study which emphasize that the application of this Just-In-Time system requires the significance of reorganizing the operations of productivity in the Jordanian manufacturing companies. This process enhances the efficiency and improvement of the production performance. More importantly, the results show that the application of Just-In-Time system (de facto) reduces the direct costs and equally improves the quality of the product which undoubtedly enhances its competitive capacities. By way of concluding, this study recommends training the employees in the Jordanian manufacturing companies to increase their skills in order to enable them to have control over the production.

Keywords: JIT system, Zero Inventory, Reduction of Cost Production.

* Accounting Department, Faculty of Economics and Administrative Sciences, Al-albait University. Received on 11/2/2006 and Accepted for Publication on 29/8/2006.