

TABLE E-1 Summary of Study Characteristics

Study	Study Type	Level of Evidence	Surgical Technique*	Patients
Gupta, 2012 ²⁶	Retrospective case series	IV	1-incision IM cortical button	8
Grewal, 2012 ⁹	Randomized controlled trial	I	1-incision suture anchors and 2-incision bone tunnels	90
Citak, 2011 ⁵	Retrospective cohort study	III	1-incision intraosseous screws, 1-incision suture anchors, and 2-incision bone tunnels	64
Siebenlist, 2011 ²⁸	Retrospective case series	IV	1-incision IM cortical button	3
Eardley, 2010 ²³	Prospective case series	IV	1-incision intraosseous screws	14
Grégoire, 2009 ¹⁸	Retrospective case series	IV	1-incision suture anchors	23
Arbuthnott, 2009 ²⁴	Retrospective case series	IV	1-incision IM cortical button	6
Bisson, 2008 ¹⁷	Retrospective case series	IV	2-incision suture anchors	45
Johnson, 2008 ¹¹	Retrospective cohort study	III	1-incision suture anchors and 2-incision bone tunnels	26
Hetsroni, 2008 ¹⁰	Retrospective cohort study	III	1-incision bone tunnels	12
Niemeyer, 2008 ¹⁴	Retrospective cohort study	III	1-incision bone tunnels	18
John, 2007 ¹⁹	Retrospective case series	IV	1-incision suture anchors	53
Chillemi, 2007 ²	Retrospective cohort study	III	2-incision suture anchors	5
Kamath, 2005 ²⁰	Retrospective case series	IV	1-incision suture anchors	5
McKee, 2005 ²¹	Retrospective case series	IV	1-incision suture anchors	53
El-Hawary, 2003 ⁷	Retrospective cohort study	III	1-incision suture anchors and 2-incision bone tunnels	19
Karunakar, 1999 ¹²	Retrospective case series	IV	2-incision bone tunnels	20
Woods, 1999 ²²	Retrospective case series	IV	1-incision suture anchors	3
Strauch, 1997 ¹⁵	Retrospective case series	IV	1-incision suture anchors	3
Davison, 1996 ⁶	Retrospective case series	IV	1-incision bone tunnels	8
Louis, 1986 ¹³	Retrospective case series	IV	1-incision bone tunnels	8
Friedmann, 1963 ⁸	Retrospective case series	IV	1-incision bone tunnels	8

*IM = intramedullary.

TABLE E-2 Summary of Functional Outcome Scores*

Study	Year	Patients	Incision #	Fixation Method	Functional Outcomes
Gupta, 2012 ²⁶	2012	8 (9 elbows)	1	IM cortical button	DASH 0, MEPS 100
Grewal, 2012 ⁹	2012	47	1	Suture anchors	DASH 7.8, ASES pain 4.6, ASES function 32.6, PREE 6.1
		43	2	Bone tunnels	DASH 5.5, ASES pain 4.4, ASES function 34.6, PREE 4.9
Citak, 2011 ⁵	2011	15	1	Intraosseous screws	DASH 3.7
		24	1	Suture anchors	DASH 10.5
		25	2	Bone tunnels	DASH 15.4
Siebenlist, 2011 ²⁸	2011	3	1	IM cortical button	None
Eardley, 2010 ²³	2010	14	1	Intraosseous screws	DASH 6.97, MEPS 96
Grégoire, 2009 ¹⁸	2009	23 (25 elbows)	1	Suture anchors	None
Arbuthnot, 2009 ²⁴	2009	6	1	Cortical button	None
Bisson, 2008 ¹⁷	2008	45	2	Suture anchors	None
Johnson, 2008 ¹¹	2008	12	1	Suture anchors	None
		14	2	Bone tunnels	None
Hetsroni, 2008 ¹⁰	2008	12	1	Bone tunnels	DASH 4, Modified Neer 1.4
Niemeyer, 2008 ¹⁴	2008	18	1	Bone tunnels	EFA 82.2
John, 2007 ¹⁹	2007	53	1	Suture anchors	Andrews-Carson excellent in 46, good in 7
Chillemi, 2007 ²	2007	5	2	Suture anchors	None
Kamath, 2005 ²⁰	2005	5	1	Suture anchors	None
McKee, 2005 ²¹	2005	53	1	Suture anchors	DASH 8.2
EI-Hawary, 2003 ⁷	2003	9	1	Suture anchors	None
		10	2	Bone tunnels	None
Karunakar, 1999 ¹²	1999	20 (21 elbows)	2	Bone tunnels	DASH 52.4
Woods, 1999 ²²	1999	3	1	Suture anchors	None
Strauch, 1997 ¹⁵	1997	3	1	Suture anchors	None
Davison, 1996 ⁶	1996	8	2	Bone tunnels	None
Louis, 1986 ¹³	1986	8	1	Bone tunnels	None
Friedmann, 1963 ⁸	1963	8	1	Bone tunnels	None

*IM = intramedullary, DASH = Disabilities of the Arm, Shoulder and Hand, MEPS = Mayo Elbow Performance Score, ASES = American Shoulder and Elbow Surgeons, PREE = Patient-Rated Elbow Evaluation, and EFA = Elbow Functional Assessment.