

ΛΑΠΑΡΟΣΚΟΠΙΚΗ ΑΝΤΙΜΕΤΩΠΙΣΗ ΤΩΝ ΝΕΟΠΛΑΣΙΩΝ ΤΟΥ ΑΝΩΤΕΡΟΥ ΠΕΠΤΙΚΟΥ

Ι. ΑΛΕΒΙΖΑΚΗΣ

ΧΕΙΡΟΥΡΓΟΣ





Δεν υπάρχει σύγκρουση συμφερόντων με τις Χορηγούς Εταιρείες:



















































Πλεονεκτήματα λαπαροσκοπικής χειρουργικής

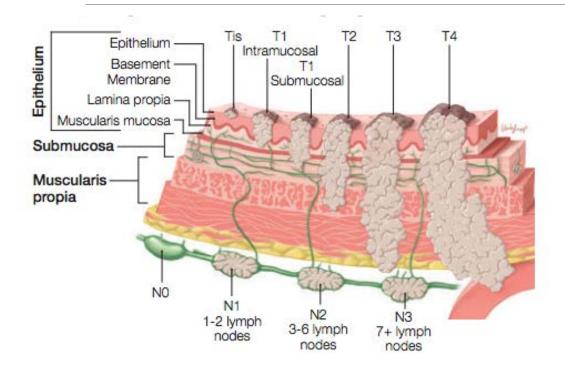
- -Μειωμένο ΜΤΧ άλγος
- -Μειωμένες απαιτήσεις σε αναλγησία
- -Μειωμένες επιπλοκές από αναπνευστικο, ΕΒΦΘ, ΜΤΧ κηλες, λοιμωξεις κλπ
- -Ταχύτερη κινητοποίηση
- -Μειωμένη δημιουργία συμφύσεων
- -Βελτιωμένο αισθητικό αποτέλεσμα
- -Ταχύτερη έναρξη επικουρικών θεραπειών σε ογκολογικές επεμβάσεις, λόγω μειωμένων MTX επιπλοκών
- -Ευχερέστερη πρόσβαση σε ανατομικά «δύσκολα» πεδία

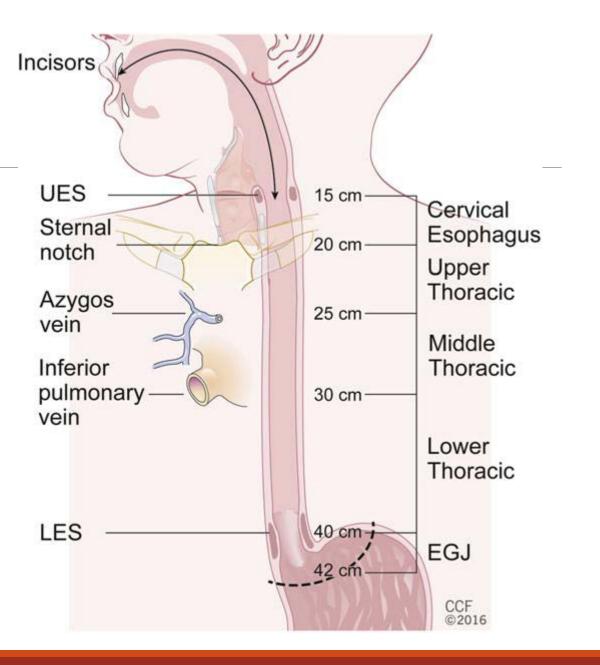
Ca οισοφάγου

8°ς πιο συχνός τύπος καρκίνου διεθνώς

- -Πλακώδες καρκίνωμα: συχνότερο σε χώρες της Ασίας
- >Σχετιζόμενο με κατανάλωση καπνού, αλκοόλ, καυτών ροφημάτων, καπνιστών τροφίμων και με κακή στοματική υγιεινή
- -Αδενοκαρκίνωμα: συχνότερο στην Βόρειο Αμερική και Ευρώπη
- >Σχετιζόμενο με ΓΟΠ, οισοφάγο Barrett

TNM Staging





TNM Staging

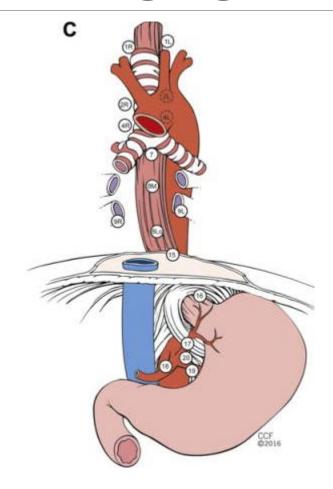
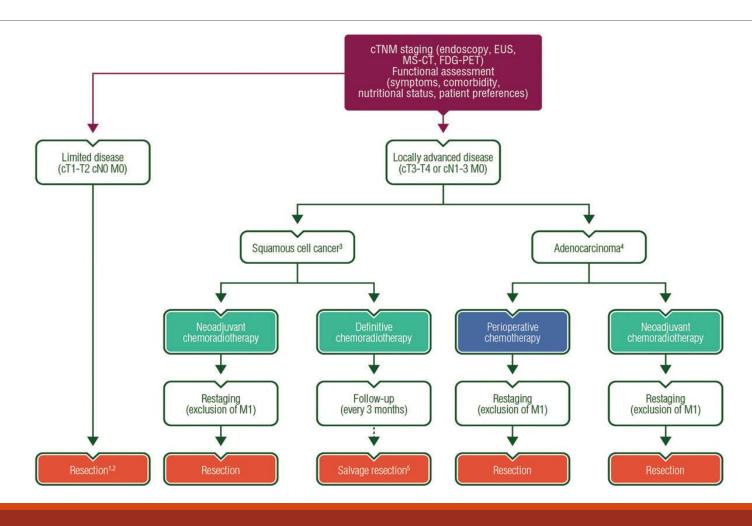


Table 2 Clinical (cTNM) stage groups						
cStage group	cT	cN	сМ			
Squamous cell carcinoma						
0	Tis	N0	MO			
T	T1	N0-1	MO			
II	T2	N0-1	MO			
	T3	N0	M0			
III	T3	N1	M0			
	T1-3	N2	M0			
IVA	T4	N0-2	M0			
	T1-4	N3	M0			
IVB	T1-4	N0-3	M1			
Adenocarcinoma						
0	Tis	N0	M0			
1	T1	N0	MO			
IIA	T1	N1	MO			
IIB	T2	N0	MO			
III	T2	N1	MO			
	T3-4a	N0-1	M0			
IVA	T1-4a	N2	M0			
	T4b	N0-2	M0			
	T1-4	N3	M0			
IVB	T1-4	N0-3	M1			

Θεραπευτική αντιμετώπιση



Οισοφαγεκτομή

1910: Janeway – Greene : Συνδυασμενη διακοιλιακή και διαθωρακική οισοφαγεκτομή

1912: Πρώτη εκτέλεση οισοφαγεκτομής (διαθωρακικής) – Franz Torek

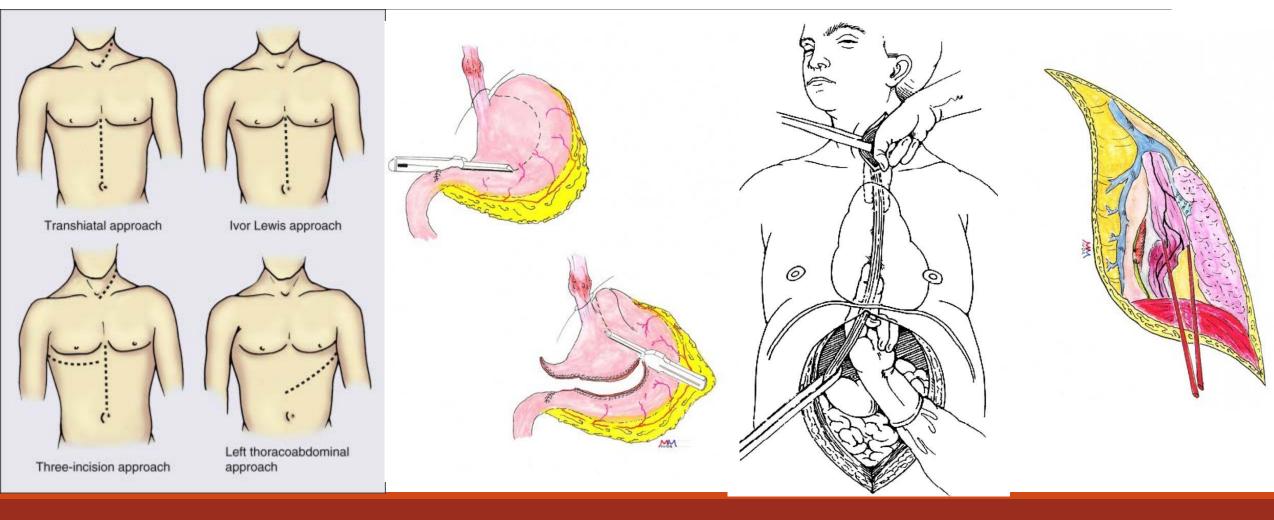
1941: Αριστερή θωρακοκοιλιακή προσπέλαση (Garlock)

1946: Συνδυασμένη δεξιά θωρακική και κοιλιακή προσπέλαση (Ivor Lewis)

1976: Συνδυασμένη δεξιά θωρακική, κοιλιακή και τραχηλική προσπέλαση (McKeown)

1978: Διατρηματική οισοφαγεκτομή (Orringer)

Οισοφαγεκτομή

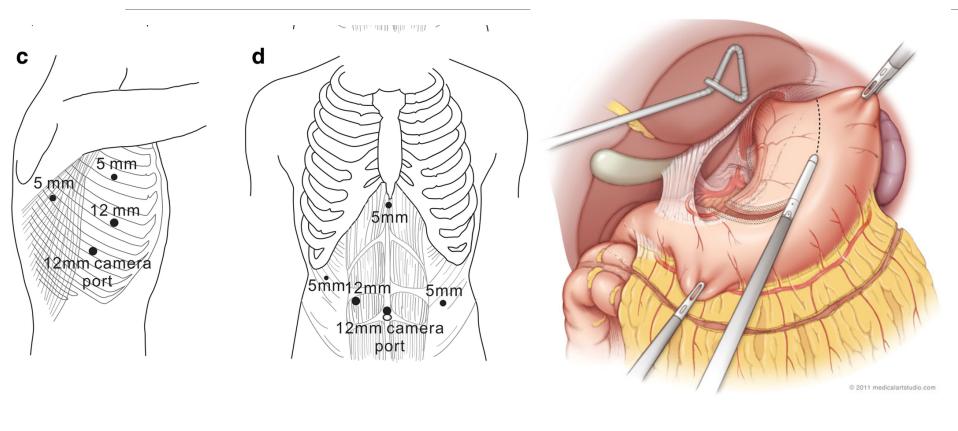


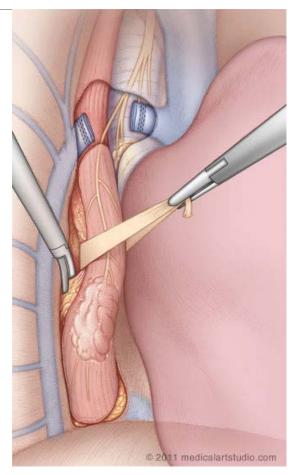
Ελάχιστα επεμβατική οισοφαγεκτομή

-Λαπαροσκοπική διατρηματική (DePaula, Swanstrom): 1995

-Συνδυασμένη θωρακοσκοπική-λαπαροσκοπική (Law, 1997 – Luketitch, 2000)

Ελάχιστα επεμβατική οισοφαγεκτομή





Αποτελέσματα

Lancet. 2012 May 19;379(9829):1887-92. doi: 10.1016/S0140-6736(12)60516-9. Epub 2012 May 1.

Minimally invasive versus open oesophagectomy for patients with oesophageal cancer: a multicentre, open-label, randomised controlled trial.

Biere SS¹, van Berge Henegouwen MI, Maas KW, Bonavina L, Rosman C, Garcia JR, Gisbertz SS, Klinkenbijl JH, Hollmann MW, de Lange ES, Bonjer HJ, van der Peet DL, Cuesta MA.

Author information

Abstract

BACKGROUND: Surgical resection is regarded as the only curative option for resectable oesophageal cancer, but pulmonary complications occurring in more than half of patients after open oesophagectomy are a great concern. We assessed whether minimally invasive oesophagectomy reduces morbidity compared with open oesophagectomy.

METHODS: We did a multicentre, open-label, randomised controlled trial at five study centres in three countries between June 1, 2009, and March 31, 2011. Patients aged 18-75 years with resectable cancer of the oesophagus or gastro-oesophageal junction were randomly assigned via a computer-generated randomisation sequence to receive either open transthoracic or minimally invasive transthoracic oesophagectomy. Randomisation was stratified by centre. Patients, and investigators undertaking interventions, assessing outcomes, and analysing data, were not masked to group assignment. The primary outcome was pulmonary infection within the first 2 weeks after surgery and during the whole stay in hospital. Analysis was by intention to treat. This trial is registered with the Netherlands Trial Register, NTR TC 2452.

FINDINGS: We randomly assigned 56 patients to the open oesophagectomy group and 59 to the minimally invasive oesophagectomy group. 16 (29%) patients in the open oesophagectomy group had pulmonary infection in the first 2 weeks compared with five (9%) in the minimally invasive group (relative risk [RR] 0·30, 95% CI 0·12-0·76; p=0·005). 19 (34%) patients in the open oesophagectomy group had pulmonary infection in-hospital compared with seven (12%) in the minimally invasive group (0·35, 0·16-0·78; p=0·005). For in-hospital mortality, one patient in the open oesophagectomy group died from anastomotic leakage and two in the minimally invasive group from aspiration and mediastinitis after anastomotic leakage.

INTERPRETATION: These findings provide evidence for the short-term benefits of minimally invasive oesophagectomy for patients with resectable oesophageal cancer.

Ann Thorac Surg. 2016 August; 102(2): 416-423. doi:10.1016/j.athoracsur.2016.02.078.

Αποτελέσματα

Minimally Invasive Versus Open Esophagectomy for Esophageal Cancer: A Population-Based Analysis

Babatunde A. Yerokun, MD, Zhifei Sun, MD, Chi-Fu Jeffrey Yang, MD, Brian C. Gulack, MD, Paul J. Speicher, MD, Mohamed A. Adam, MD, Thomas A. D'Amico, MD, Mark W. Onaitis, MD, David H. Harpole, MD, Mark F. Berry, MD, and Matthew G. Hartwig, MD Department of Surgery, Duke University Medical Center, Durham, North Carolina; Department of Surgery, Division of Cardiovascular and Thoracic Surgery, Duke University Medical Center, Durham, North Carolina; and Department of Cardiothoracic Surgery, Stanford University, Stanford, California

Abstract

Background—The objective of this study was to evaluate outcomes of minimally invasive approaches to esophagectomy using population-level data.

Methods—Multivariable regression modeling was used to determine predictors associated with the use of minimally invasive approaches for patients in the National Cancer Data Base who underwent resection of middle and distal clinical T13N03M0 esophageal cancers from 2010 to 2012. Perioperative outcomes and 3-year survival were compared between propensity-matched groups of patients with esophageal cancer who underwent minimally invasive esophagectomy (MIE) or open esophagectomy (OE). A subgroup analysis was performed to evaluate the impact of using robotic-assisted operations as part of the minimally invasive approach.

Results—Among 4,266 patients included, 1,308 (30.6%) underwent MIE. It was more likely to be used in patients treated at academic (adjusted odds ratio [OR], 10.1; 95% confidence interval [CI], 4.2–33.1) or comprehensive cancer facilities (adjusted OR, 6.4; 95% CI, 2.6–21.1). Compared with propensity-matched patients who underwent OE, patients who underwent MIE had significantly more lymph nodes examined (15 versus 13; p = 0.016) and shorter hospital lengths of stay (10 days versus 11 days; p = 0.046) but similar resection margin positivity, readmission, and 30-day mortality (all p > 0.05). Survival was similar between the matched groups at 3 years for both adenocarcinoma and squamous cell carcinoma (p > 0.05). Compared with MIE without robotic assistance, use of a robotic approach was not associated with any significant differences in perioperative outcomes (p > 0.05).

Conclusions—The use of minimally invasive techniques to perform esophagectomy for esophageal cancer is associated with modestly improved perioperative outcomes without

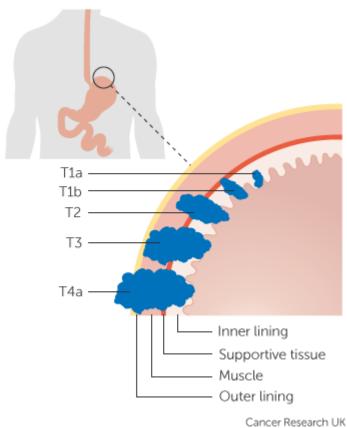
Ca στομάχου

5ος πιο συχνός τύπος καρκίνου διεθνώς

-Συσχέτιση με λοίμωξη Η. Pylori, κατανάλωση αλκοόλ, επεξεργασμένου κρέατος, δίατα πτωχή σε λαχανικά-φρούτα

-Ιδιαίτερα συχνός σε ασιατικές χώρες

TNM Staging



Regional lymph nodes (N)

NX	Regional lymph node(s)		
	cannot be assessed		
N0	No regional lymph node		
	metastasis		
N1	Metastasis in 1-2 regional		
	lymph nodes		
N2	Metastasis in 3-6 regional		
	lymph nodes		
N3	Metastasis in 7 or more		
	regional lymph nodes		
N3a	Metastasis in 7-15 regional		
	lymph nodes		
N3b	Metastasis in 16 or more		
	regional lymph nodes		

When T is	And N is	And M is	Then the stage group is
Tis	N0	M0	0
T1	N0	M0	I
T2	N0	M0	I
T1	N1, N2, or N3	M0	IIA
T2	N1, N2, or N3	M0	IIA
T3	N0	M0	IIB
T4a	N0	M0	IIB
T3	N1, N2, or N3	M0	III
T4a	N1, N2, or N3	M0	III
T4b	Any N	M0	IVA
Any T	Any N	M1	IVB

Θεραπευτική αντιμετώπιση

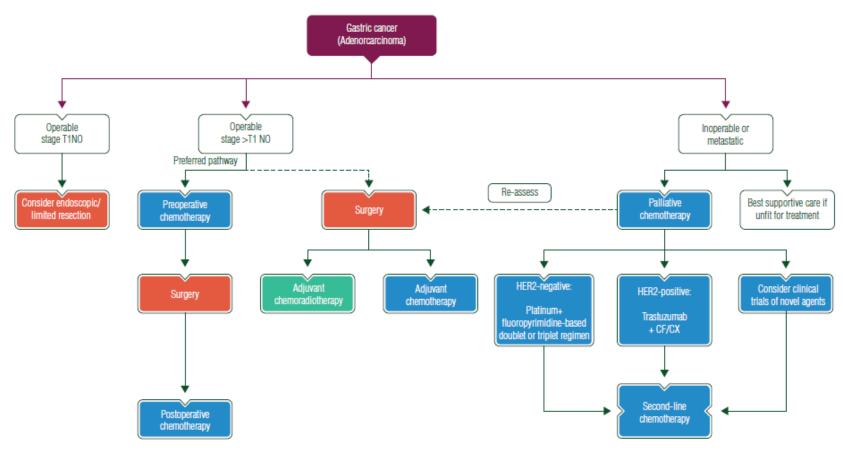


Figure 1. Gastric cancer treatment algorithm.

Χειρουργικές εκτομές στομάχου

"T1 tumours that do not meet criteria for endoscopic resection require surgery"

"Lymph node dissection for T1 tumours may be confined to perigastric lymph nodes and include local N2 nodes (D1+, with variation in nodal groups dissected according to the site of cancer)."

"For stage IB—III gastric cancer, radical gastrectomy is indicated. Subtotal gastrectomy may be carried out if a macroscopic proximal margin of 5 cm can be achieved between the tumour and the gastroesophageal junction. For diffuse cancers, a margin of 8 cm is advocated. Otherwise, a total gastrectomy is indicated [III, A]."

ESMO Guidelines for Gastric Cancer, 2016

Λεμφαδενικός καθαρισμός

"Excision of a minimum of 15 lymph nodes to allow reliable staging"

-East vs. West

"Consensus opinion is that, in Western countries, medically fit patients should undergo D2 dissection that is carried out in specialised, high-volume centres with appropriate surgical expertise and postoperative care [I, B]"

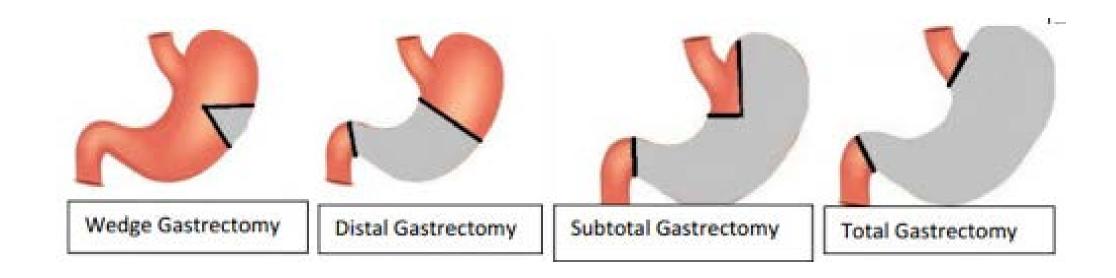
ESMO Guidelines for Gastric Cancer, 2016

GISTs

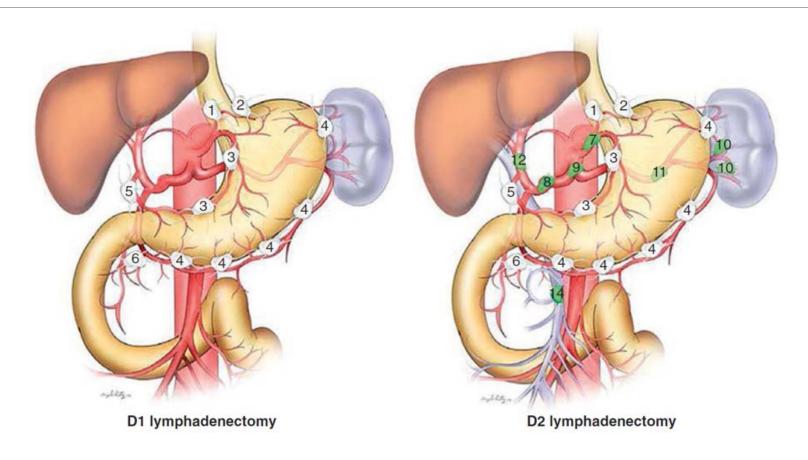
"The standard treatment of localised GISTs is complete surgical excision of the lesion, with no dissection of clinically negative lymph nodes [III, A]. If laparoscopic excision is planned, the technique needs to follow the principles of oncological surgery [III, A] .A laparoscopic approach is clearly discouraged in patients who have large tumours, because of the risk of tumour rupture, which is associated with a very high risk of relapse. R0 excision is the goal (i.e. an excision whose margins are clear of tumour cells). When R0 surgery implies major functional sequelae, and preoperative medical treatment is not effective, the decision can be made with the patient to accept possible R1 (microscopically positive) margins [IV, B]"

ESMO Guidelines for GISTs, 2018

Γαστρεκτομές



Λεμφαδενικοί καθαρισμοί



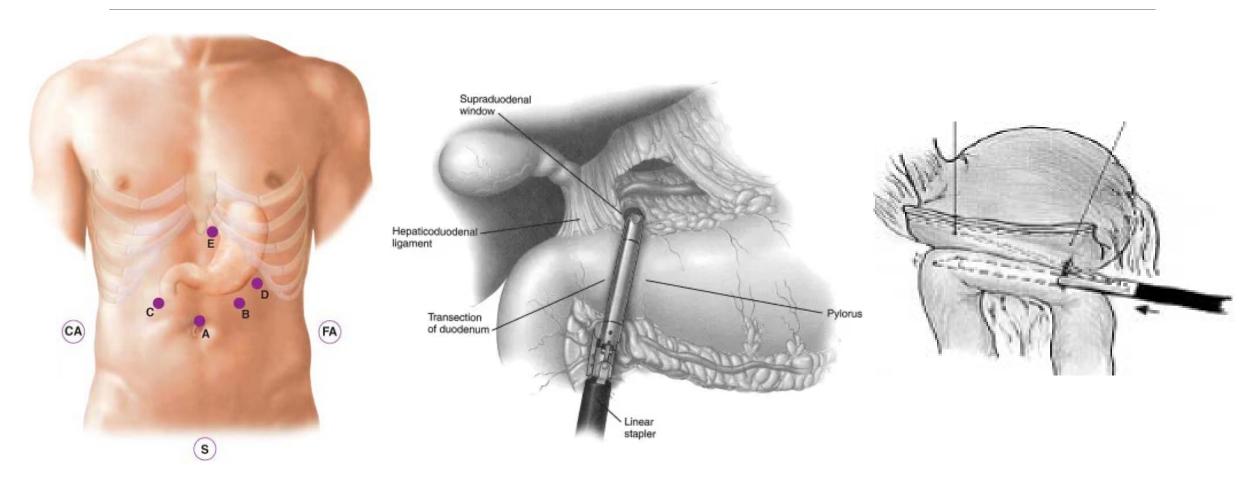
Λαπαροσκοπική γαστρεκτομή

-Kitano, 1992: Laparoscopy assisted Billroth I gastrectomy

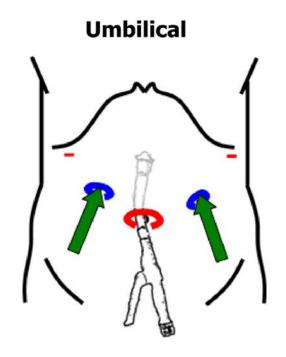
- Goh, 1992: Totally intra-abdominal laparoscopic Billroth II gastrectomy

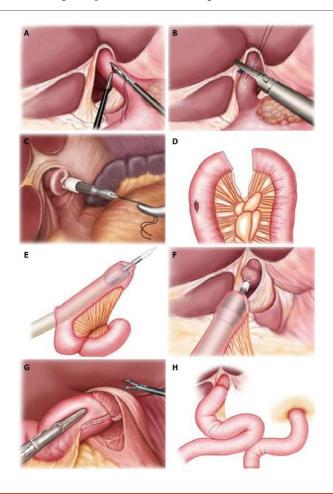
-Azagra, 1993: Laparoscopic total gastrectomy

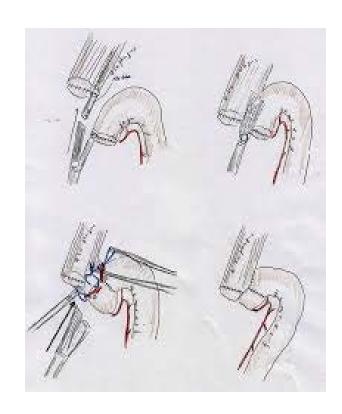
Λαπαροσκοπική γαστρεκτομή

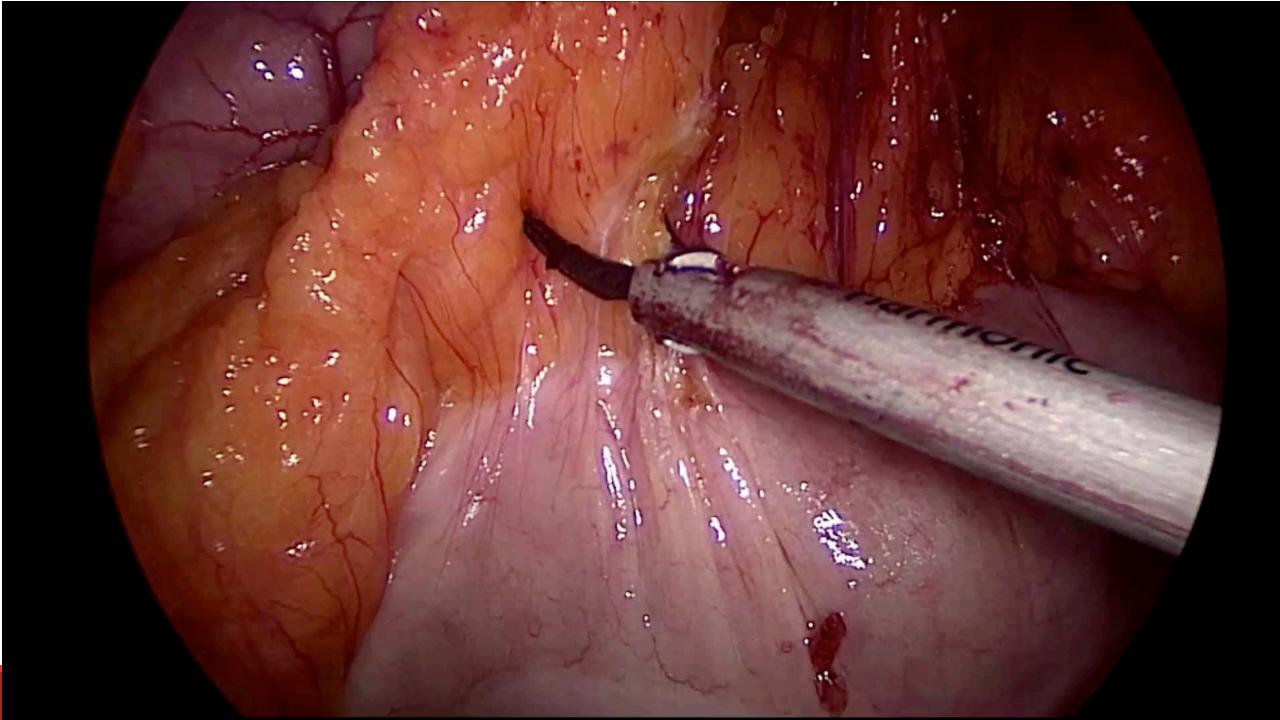


Λαπαροσκοπική γαστρεκτομή









Αποτελέσματα

Comparison of laparoscopic versus open gastrectomy for advanced gastric cancer: an updated meta-analysis

Yingjun Quan 1 · Ao Huang 2 · Min Ye 1 · Ming Xu 1 · Biao Zhuang 1 · Peng Zhang 1 · Bo Yu 1 · Zhijun Min 1

Received: 25 September 2014/Accepted: 13 July 2015/Published online: 28 July 2015

The International Gastric Cancer Association and The Japanese Gastric Cancer Association 2015

Abstract

Background Laparoscopic gastrectomy (LG) has been used as an alternative to open gastrectomy (OG) to treat early gastric cancer. However, the use of LG for advanced gastric cancer (AGC) has been in debate.

Methods Literature retrieval was performed by searching PubMed, EMBASE, and the Cochrane library up to July 2014. Potential studies comparing the surgical effects between LG with OG were evaluated and data were extracted accordingly. Meta-analysis was carried out using RevMan. The pooled risk ratio and weighted mean difference (WMD) with 95 % confidence interval (95 % CI) were calculated.

Results Overall, 26 studies were included in this metaanalysis. LG had some advantages over OG, including shorter hospitalization (WMD, -3.63, 95 % CI, -4.66 to -2.60; P < 0.01), less blood loss (WMD, -161.37, 95 % CI, -192.55 to $-13\overline{0.18}$; P < 0.01), faster bowel recovery (WMD, -0.78, 95 % CI, -1.05 to -0.50; P < 0.01), and earlier ambulation (WMD, -0.95, 95 % CI, -1.47 to -0.44; P < 0.01). In terms of surgical and oncological safety, LG could achieve similar lymph nodes (WMD, -0.49, 95 % CI, -1.78 to 0.81; P = 0.46), a lower complication rate [odds ratio (OR), 0.71, 95 % CI, 0.59 to 0.87; P < 0.01], and overall survival (OS) and disease-free survival (DFS) comparable to OG.

Conclusions For AGCs, LG appeared comparable with OG in short- and long-term results. Although more time was needed to perform LG, it had some advantages over OG in achieving faster postoperative recovery. Ongoing trials and future studies could help to clarify this controversial issue.

Keywords Laparoscopic gastrectomy · Open gastrectomy · Advanced gastric cancer · Meta-analysis

Introduction

Gastric cancer is the fourth most frequently occurring cancer and the second most common cause of cancer-related death worldwide, accounting for 8 % of total and 5061 AGC patients 2193 (43.3 %) LG 2868 (56.7 %) OG



"Please Mr. Hernandez, make yourself at home!"

THANK YOU