



(12) **EUROPEAN PATENT APPLICATION**

(88) Date of publication A3:
30.10.2013 Bulletin 2013/44

(51) Int Cl.:
A61B 17/32 (2006.01)

(43) Date of publication A2:
30.03.2011 Bulletin 2011/13

(21) Application number: **10179625.8**

(22) Date of filing: **08.09.2000**

(84) Designated Contracting States:
DE ES FR GB IT

(30) Priority: **05.10.1999 US 413225**

(62) Document number(s) of the earlier application(s) in accordance with Art. 76 EPC:
00960037.0 / 1 223 869

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(54) **Multifunctional curved blade for use with an ultrasonic surgical instrument**

(57) The present invention relates, in general, to ultrasonic surgical clamping instruments and, more particularly, to a multi-functional curved shears blade for an ultrasonic surgical clamping instrument (120). Disclosed is an ultrasonic surgical instrument that combines end effector geometry to best affect the multiple functions of a shears type configuration. The shape of the blade is characterized by a radius cut to form a curved, and potentially tapered geometry. This cut creates a curved surface including a concave surface (53), and a convex surface (57). The convex surface transitions into a short, straight, flat surface. The length of this straight portion affects, in part, the acoustic balancing of the transverse motion induced by the curved shape. Relative to straight blade tips, the tip curvature of the present design provides improved visibility of the transection site and improved access to targeted tissues.

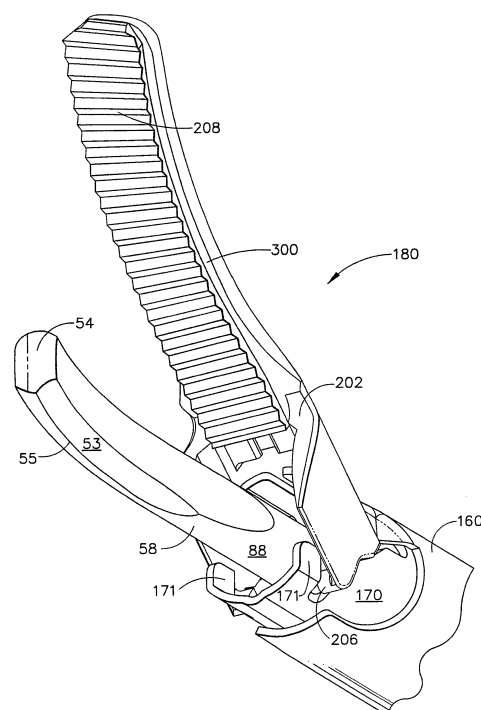


FIG. 36



EUROPEAN SEARCH REPORT

Application Number
EP 10 17 9625

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			TECHNICAL FIELDS SEARCHED (IPC)
			A61B
The present search report has been drawn up for all claims			
Place of search Munich		Date of completion of the search 24 September 2013	Examiner Held, Günter
CATEGORY OF CITED DOCUMENTS X : particularly relevant if taken alone Y : particularly relevant if combined with another document of the same category A : technological background O : non-written disclosure P : intermediate document T : theory or principle underlying the invention E : earlier patent document, but published on, or after the filing date D : document cited in the application L : document cited for other reasons & : member of the same patent family, corresponding document			

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EPO FORM 1503 03.82 (P04C01)

**ANNEX TO THE EUROPEAN SEARCH REPORT
ON EUROPEAN PATENT APPLICATION NO.**

EP 10 17 9625

This annex lists the patent family members relating to the patent documents cited in the above-mentioned European search report.
The members are as contained in the European Patent Office EDP file on
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专利名称(译)	多功能弯曲刀片，用于超声波手术器械		
公开(公告)号	EP2301452A3	公开(公告)日	2013-10-30
申请号	EP2010179625	申请日	2000-09-08
[标]申请(专利权)人(译)	伊西康内外科公司		
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当前申请(专利权)人(译)	爱惜康内镜手术，INC.		
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IPC分类号	A61B17/32 A61B17/3211 A61B18/00		
CPC分类号	A61B17/320092 A61B2017/320093 A61B2017/320094 A61B2017/320095		
代理机构(译)	FISHER，ADRIAN JOHN		
优先权	09/413225 1999-10-05 US		
其他公开文献	EP2301452A2 EP2301452B1		
外部链接	Espacenet		

摘要(译)

本发明一般涉及超声外科夹持器械，更具体地说，涉及一种用于超声外科夹持器械（120）的多功能弯曲剪刀片。公开了一种超声外科手术器械，其结合了末端执行器几何形状以最好地影响剪切型构造的多种功能。刀片的形状的特征在于半径切割以形成弯曲的且可能锥形的几何形状。该切口形成包括凹面（53）和凸面（57）的曲面。凸面过渡成短而直的平坦表面。该直线部分的长度部分地影响由弯曲形状引起的横向运动的声学平衡。相对于直刀片尖端，本设计的尖端曲率提供了横切部位的改善的可见性和改善了对目标组织的接近。

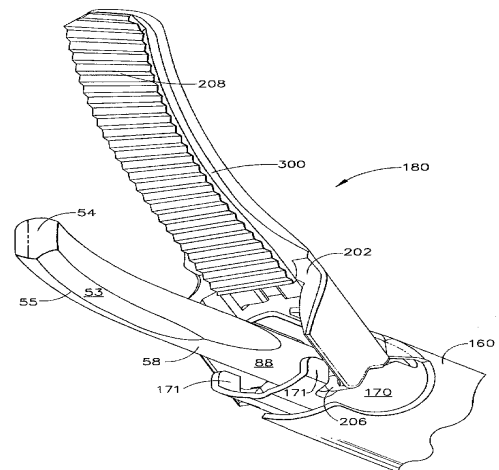


FIG. 36