

CARDIOVASCULAR PATHOLOGY: SURGERY AND INTERVENTIONS.

Proceedings of the Third Moscow International Course

May 16–17, 2015

Editors
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Content

<i>Leo A. Bockeria (Moscow, Russia)</i>	
<i>Marko Turina (Zurich, Switzerland)</i>	
Opening Remarks	III
<i>James L. Cox</i>	
Maze myths	3
<i>Roberto Chiesa</i>	
Updated strategy for organ protection during TAAA open repair	24
<i>Claudio Muneretto</i>	
Hybrid coronary revascularization: techniques and results	44
<i>Paul Sergeant</i>	
Can we teach, qualify and quantify a good coronary anastomosis.....	69
<i>Peter Zilla</i>	
Heart valve surgery at the interface between first and third world.....	88
<i>Leo A. Bockeria</i>	
Cardiovascular surgery and interventions in Russian Federation	107
<i>Ralph J. Damiano</i>	
Surgical treatment of atrial fibrillation in patients with mitral valve disease	123
<i>Friedrich W. Mohr</i>	
The development of TAVI	150
<i>Francis Wellens</i>	
Cardiac surgery for heart failure.....	175
<i>David Taggart</i>	
Is it time to abandon off-pump CABG	192
<i>Roberto Chiesa</i>	
Open conversion after TEVAR. Tips & Tricks	209
<i>Leslie Miller</i>	
Use of stem cells in cardiac surgery	236
<i>Gino Gerosa</i>	
The role of MCS in acute cardiogenic shock: from ECMO to TAH	255
<i>Victor Hraska</i>	
ASO in complex transposition with criss-cross heart, multiple VSD's, straddling of TV, and PS	304
<i>Francis Wellens</i>	
Video session on thoracoscopic implantation of ICD	315
<i>Viktor Hraska</i>	
Cone reconstruction of Ebstein's malformation	319
<i>Gino Gerosa</i>	
Evolution of LVAD implantation techniques: from conventional to micro-invasive surgery.....	328

<i>James L. Cox</i>	
The Cox-Maze-IV procedure	336
<i>Francis Wellens</i>	
The cardiac surgeon and the treatment of arrhythmias	340
<i>Gino Gerosa</i>	
Miniaturized LVAD: what is in the pipeline?	353
<i>David Taggart</i>	
What is the 2 nd best arterial graft? IMA or RA.....	388
<i>Paul Sergeant</i>	
It can happen to you one day	407
<i>Leslie Miller</i>	
Left ventricular assist devices for advanced heart failure: patient selection	421
<i>Roland Hetzer</i>	
New strategies in valve repair: anterior leaflet retention plasty for systolic anterior motion in hypertrophic obstructive cardiomyopathy, posterior leaflet augmentation for ischemic mitral incompetence and double orifice valve technique for tricuspid valve insufficiency	443
<i>Ralph J. Damiano</i>	
Recent advances in the surgical treatment of lone atrial fibrillation	463
<i>Friedrich W. Mohr</i>	
Bilateral internal thoracic arteries: skeletonize and T-off	492
<i>Marko Turina</i>	
Grown-up congenital heart disease: a condition in search of optimal treatment	505
<i>Roland Hetzer</i>	
Pediatric mechanical circulatory support	527
<i>Peter Zilla</i>	
Tackling the disparity: rheumatic heart disease and the lack of cardiac surgery in developing world.....	552
<i>Claudio Muneretto</i>	
Endoscopic treatment of lone AF.....	570
<i>Viktor Hraska</i>	
Anatomic correction of ccTGA: new ideas of management	593
<i>Leo A. Bockeria</i>	
Surgical treatment of atrial fibrillation: the why and the how	612
<i>Roland Hetzer</i>	
Repair techniques to correct the tricuspid valve incompetence in Ebstein's anomaly	623
<i>James L. Cox</i>	
Hybrid Maze procedures vs. hybrid non-Maze procedures	631

Opening Remarks

Leo A. Bockeria.

Dear colleagues,

Let me welcome you here in Bakoulev Center for Cardiovascular Surgery in Moscow for the third time. It is a great privilege for us to have such a wonderful team as it was also before. In my view, we have a very interesting program and here are the people in the audience, who would like to learn the new trends in cardiovascular surgery, interventional cardiology, electrophysiology. So you have an opportunity to share your knowledge and experience with the younger professionals.

Welcome again and I wish to all of us to have these two days applying new knowledge not only in medicine, but also around the city, around the country and culture.

Marko Turina.

Ladies and Gentlemen. Welcome to the III-d Moscow International Course: Cardiovascular pathology: surgery and interventions. We have invited a group of international experts to share with the most actual information on the treatment of cardiovascular pathology. Within two days a series of lectures and presentations will be presented. As in previous years we thank professor Leo Bockeria for the organization of this Course and financial support for this Course.

**Documented *Left Atrial*
Macro-Reentrant Circuits in N-PAF**

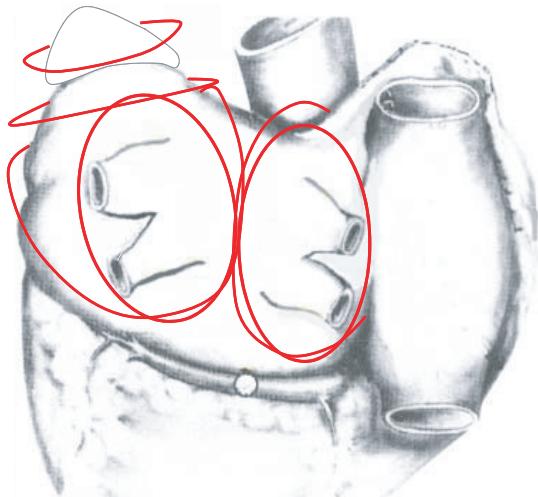


Fig. 27

Firstly a box lesion around the pulmonary veins, a lesion up to the left atrial appendage and a clip on it are performed. (Fig. 28)

Left Atrial Lesions

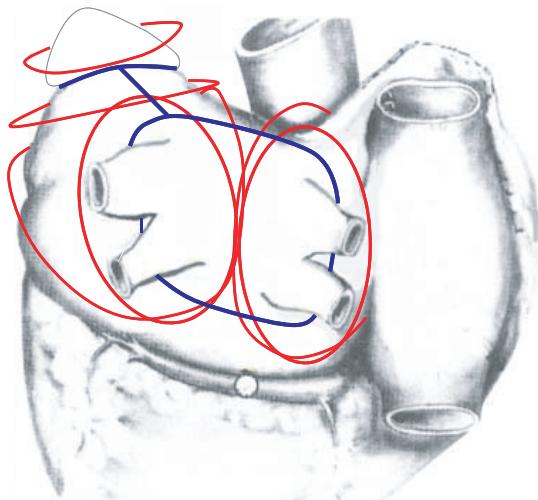
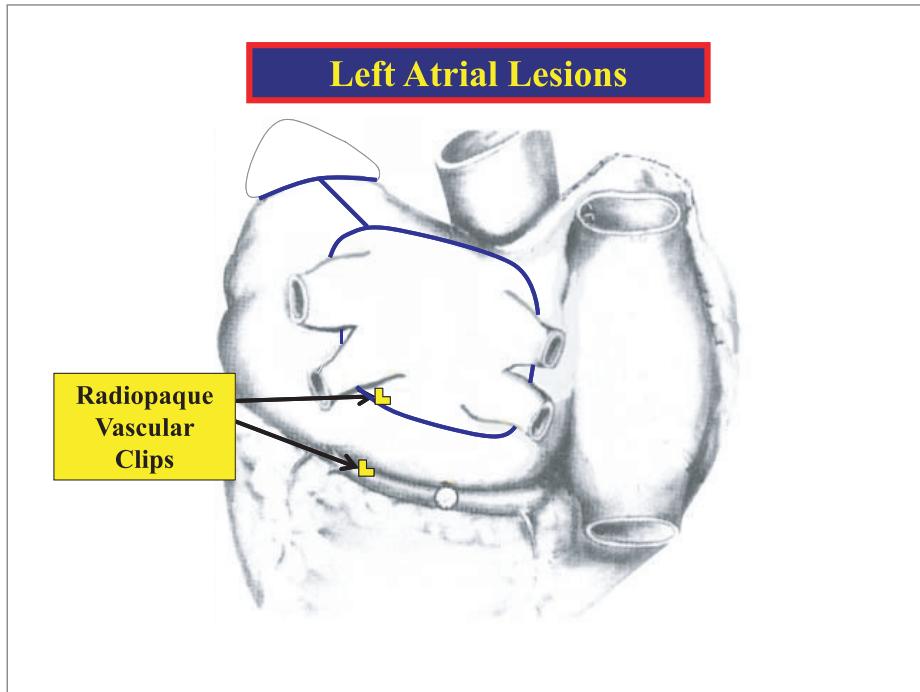
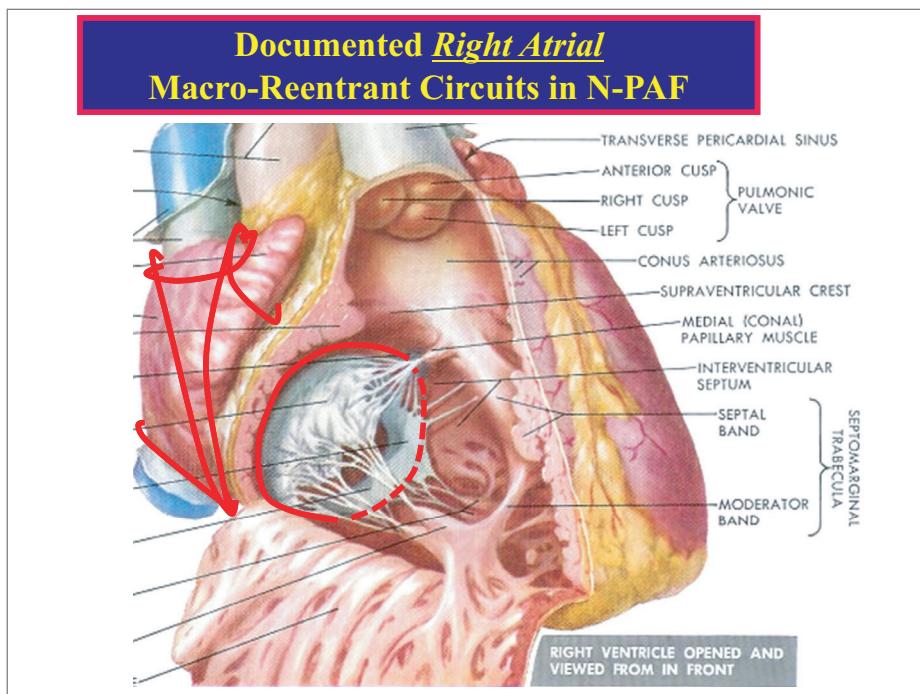


Fig. 28

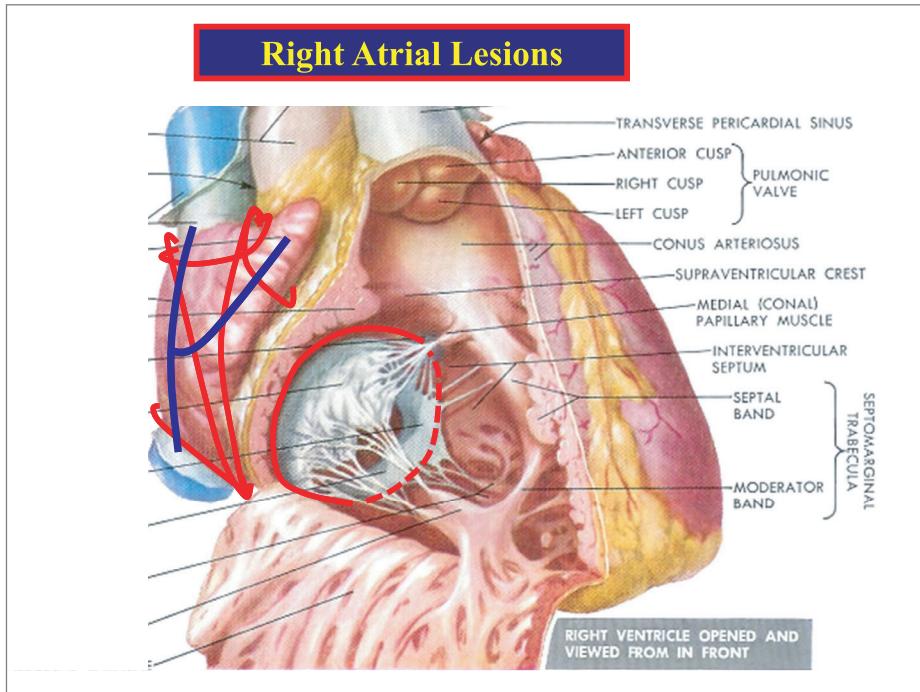
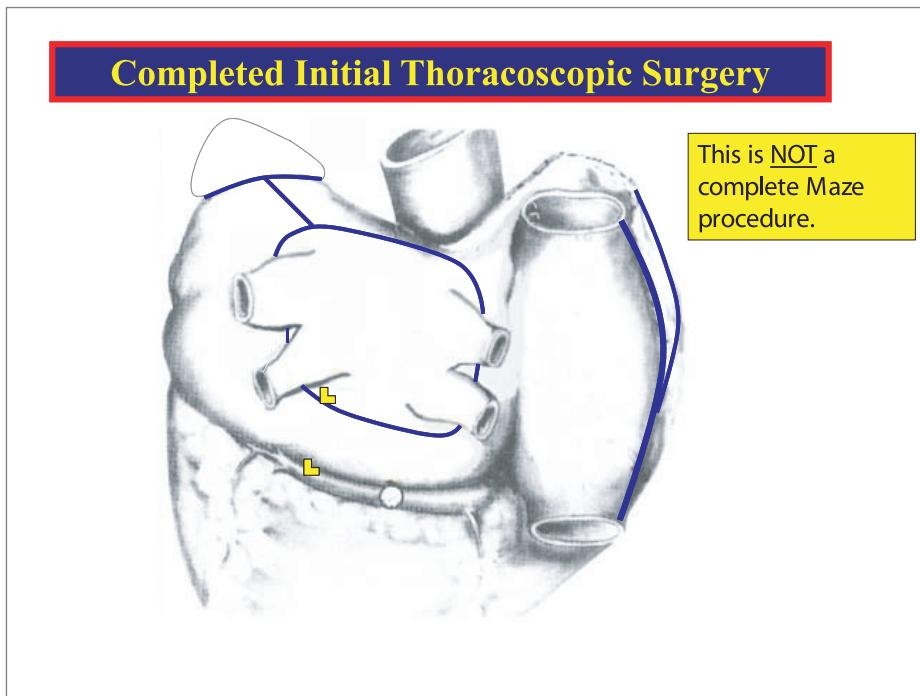
Then some radiopaque vascular clips are put. If there is a reentrant circuit around here, a cardiologist has to go to the coronary sinus, make a lesion between those clips and solve the problem. (Fig. 29)

**Fig. 29**

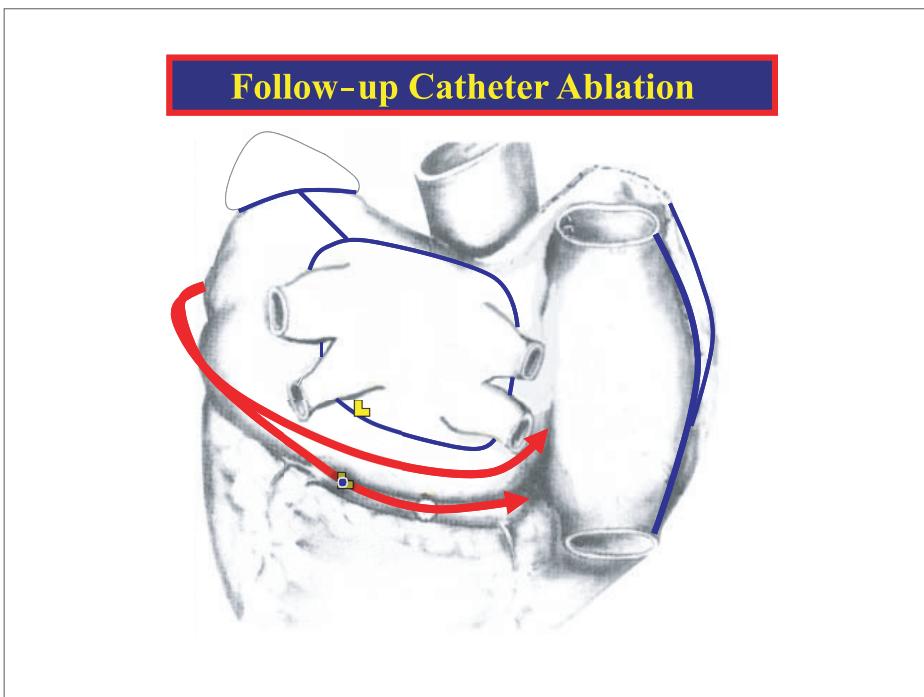
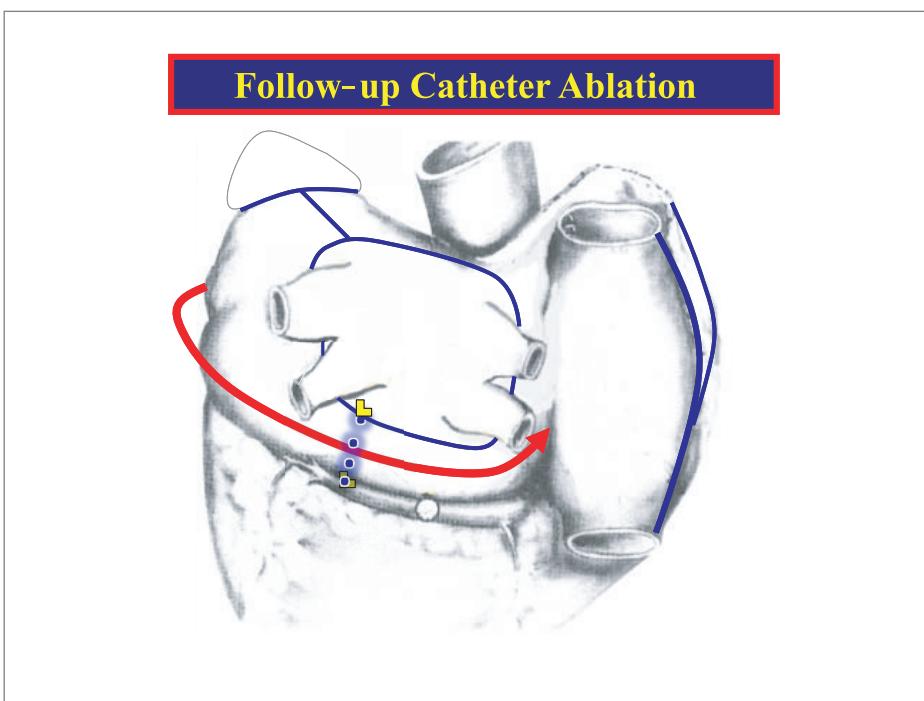
On the right side we documented right atrial macro-reentrant circuits. I have shown Haissaguerre this slide and asked if he agrees with the documented reentrant circuits and he said "yes". Now almost all of them use the cavo-tricuspid isthmus. (Fig. 30, 31)

**Fig. 30**

So the initial thoracoscopic procedure would be the box lesion in the left, lesion up to the left atrial appendage, put a radiopaque vascular clip, SVC to IVC lesion up to the right atrial appendage and stop. Notice that this is not the complete Maze procedure. (Fig. 32)

**Fig. 31****Fig. 32**

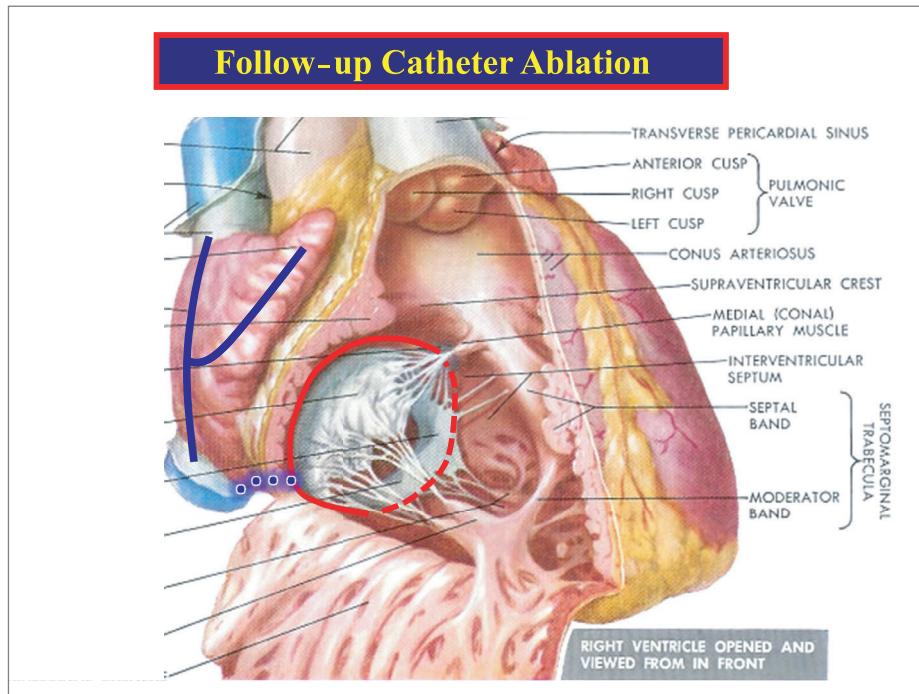
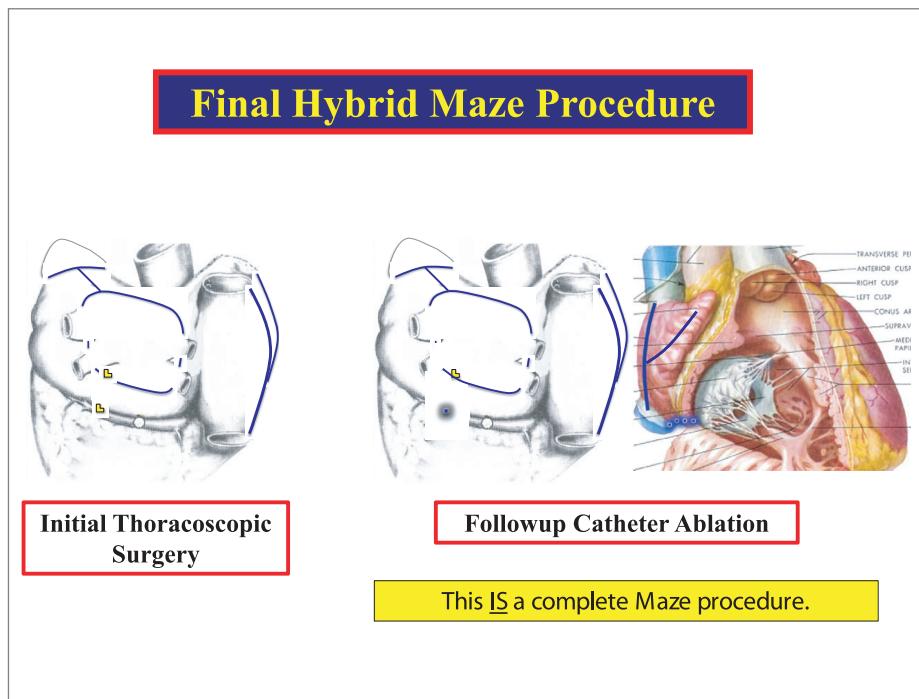
After 6 weeks to 3 months the follow-up catheter ablation is performed. If a patient has perimital flutter a lesion onto a coronary sinus with a catheter between the radiopaque clip and the myocardium inside is performed. That is the left sided Maze. (Fig. 33, 34)

**Fig. 33****Fig. 34**

If a patient has anything on the right side, the cavo-tricuspid isthmus line is performed. (Fig. 35)
The initial thoracoscopic surgery and follow-up catheter ablation. That in fact is a complete Maze procedure. (Fig. 36)

So the promises of hybrid Maze procedure are:

- Outcomes for the catheter ablation of AF will not improve until better catheter tools are developed.
- New off-pump thoracoscopic procedures make surgery a viable option as the initial treatment for stand-alone AF, provided there is an obligatory follow-up catheter ablation.

**Fig. 35****Fig. 36**

- New “Hybrid Non-Maze Procedures” are based on EP mapping, a concept that has failed in the past. The risk is that these map-guided procedures will fail with time.
- “Hybrid Maze Procedures” should produce outcomes equal those for the open-heart surgical Maze Procedure.

Thank you.

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