Poster Template Guidelines

You may use any of the three templates given in this document.

You may use as many info frames for your descriptions & images as you wish, as long as it fit in a 90X120 cm poster.

Us the info frames for your images also.

The bottom (corner) frames will appear as off-sided. This was done on PURPOSE and should be left this way. The idea is that when printed, the bottom and outer edges of this frame shouldn´t appear.

You may move the frames around the template and add as much as you wish. The given ones are just to serve as reference.

Don´t change the template colors.

You should use the FOCO font. In case you don´t have it in your PC, you may find it in the CONEIX under : Documents->Others->CVCBusinessCards and install it in your PC.

The slides are dimension for a 90x120 cm poster.

Title

Author1, Author2, Author3, etc.
Computer Vision Center (CVC)
E-mail

Centre de Visió per Computador

Subtitle

Info & Images

Subtitle

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Subtitle

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Relevant Info (sponsors, partners, projects, acknowledgments, etc)

[1] Reference 1
[2] Reference 2
…

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[2] Reference 2
…

Object localization enhancement by multiple segmentations fusion

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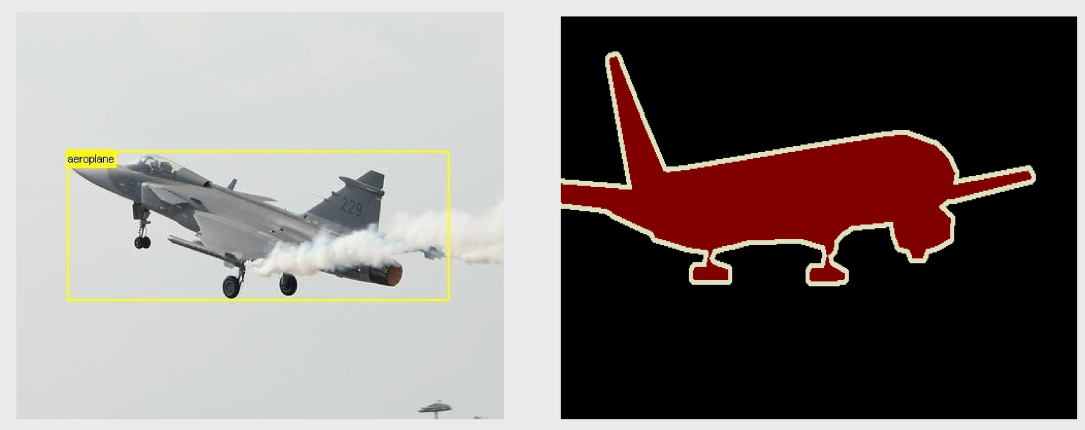
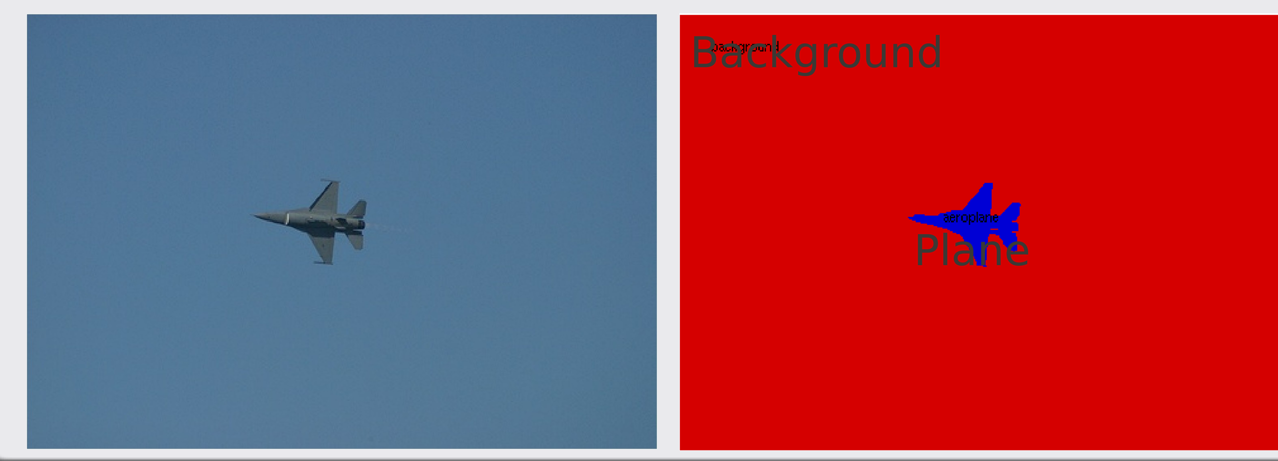
Image segmentation

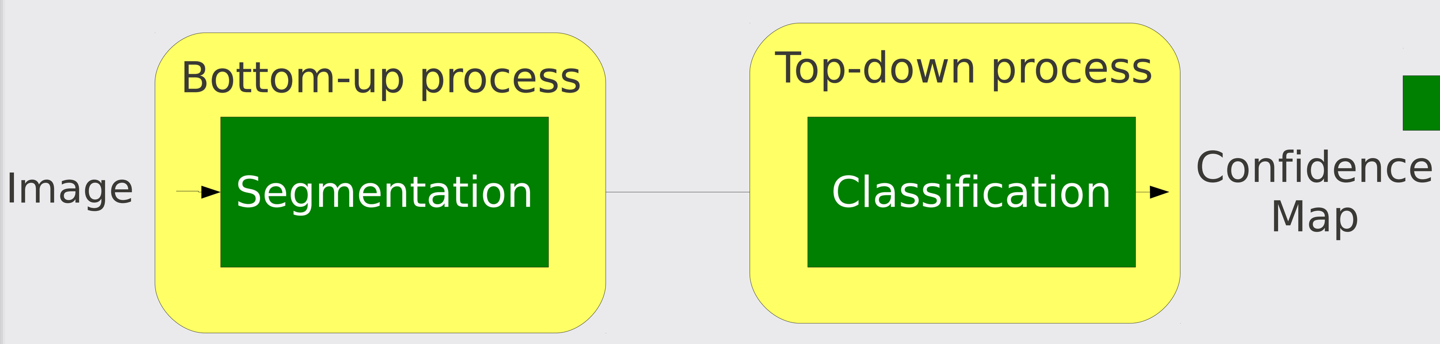
Object localization



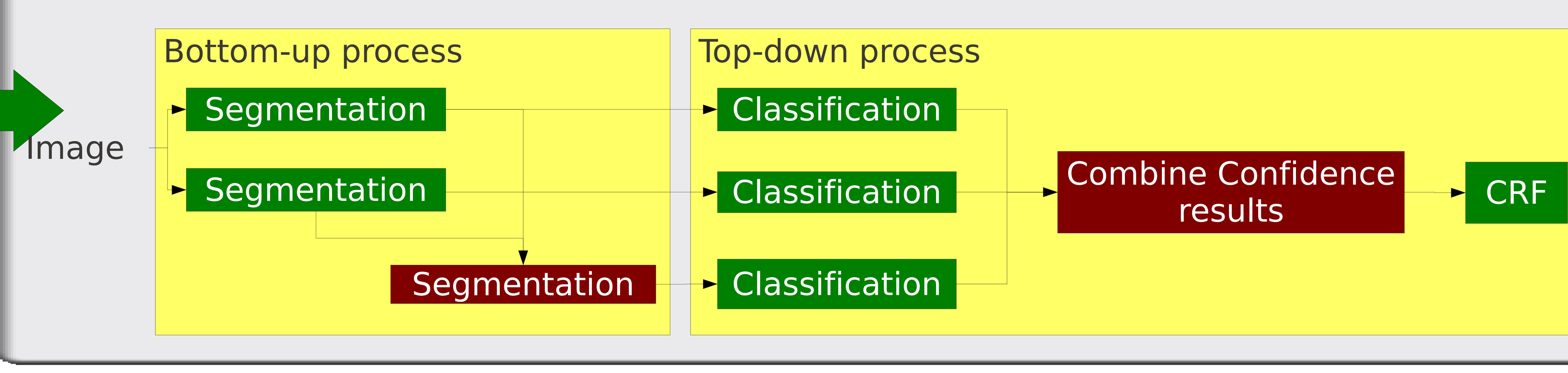
Object class segmentation

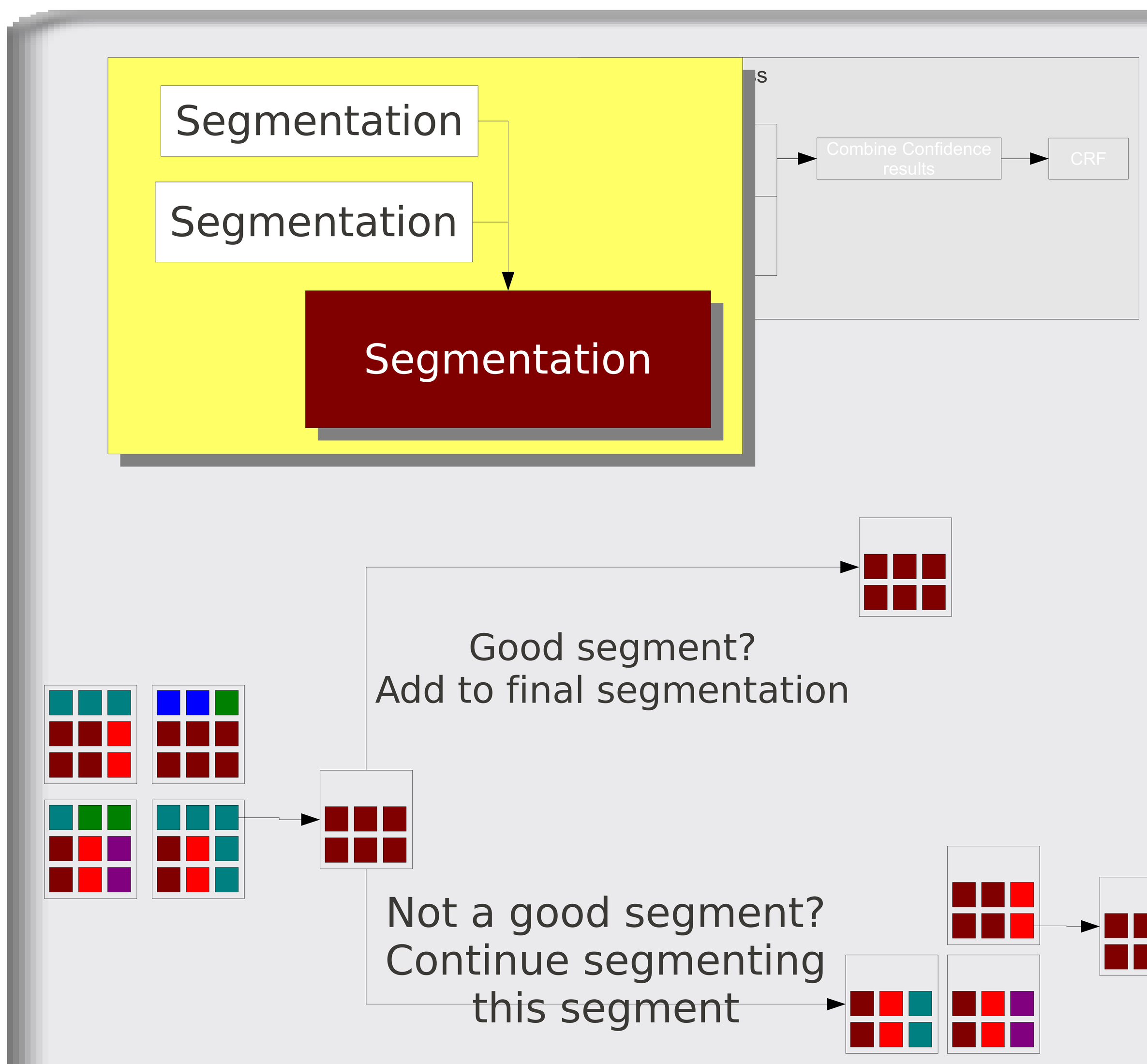


General framework

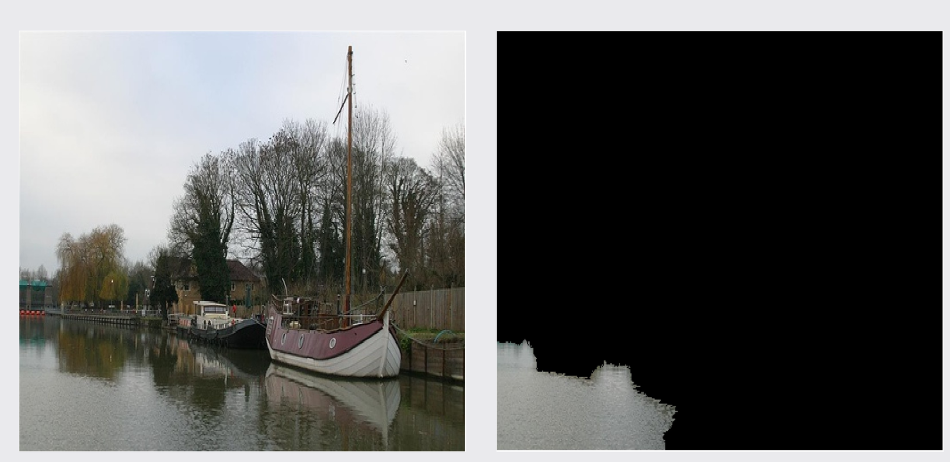


Proposed framework



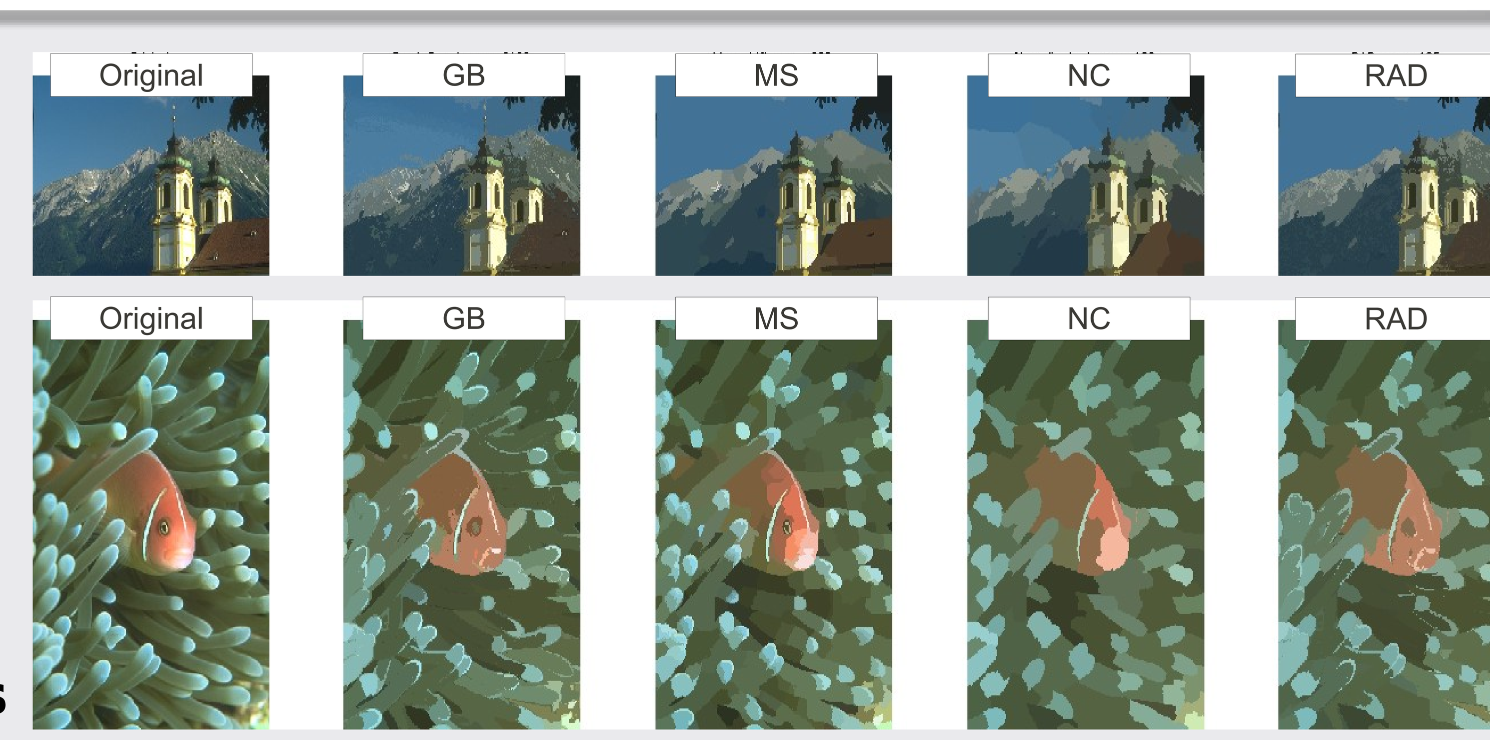


What is a good segment?

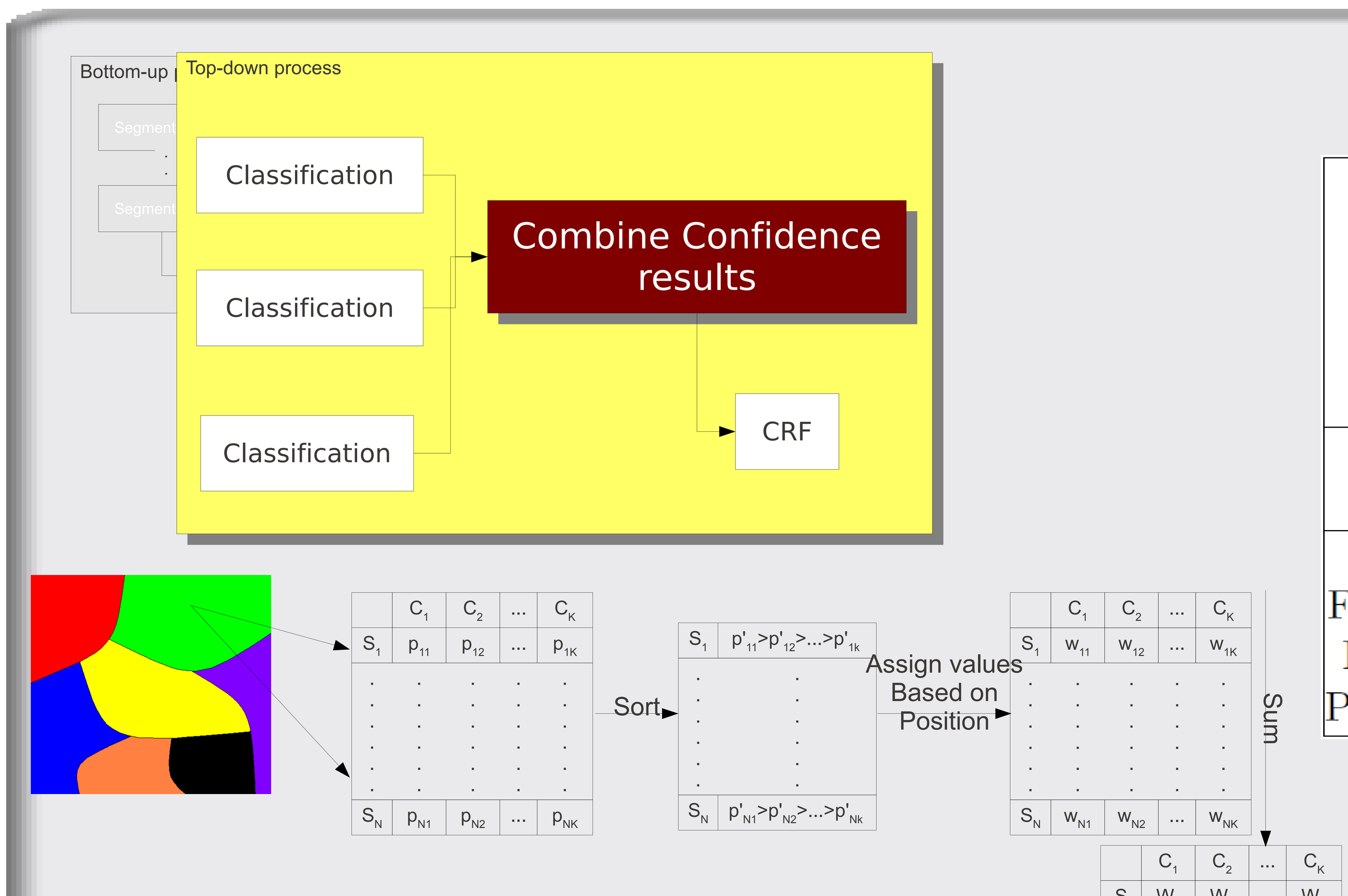


Evaluating segments goodness

- Color distribution
- Unimodality test
- RAD
- Alternate segmentation



	PRI	VoI	GCE	BDE
Mean-Shift	0.7424	4.5293	**0.0842**	**14.2716**
Graph-Based	0.7082	5.1148	0.1150	17.2428
Normalized-cut	0.7079	4.1370	0.1153	14.7337
Mix+RAD	**0.7483**	**3.5364**	0.1433	14.8047



	Background	Aeroplane	Bicycle	Bird	Boat	Bottle	Bus	Car	Cat	Chair	Cow	Dinningtable	Dog	Horse	Motorbike	Person	Pottedplant	Sheep	Sofa	Train	TVmonitor	Avg. Accuracy
Best Mix	49	21	20	10	15	**9**	32	48	56	28	13	**37**	56	19	61	48	33	32	**45**	44	38	**34**
Mix all	50	16	19	15	11	7	32	47	**62**	**29**	**14**	31	53	20	63	58	27	26	39	43	38	33
Viitaniemi (2007)	23	19	21	5	**16**	3	1	**78**	1	3	1	23	**69**	**44**	42	0	**65**	**40**	35	**89**	**71**	30
Fulkerson et al. (2009)	56	26	**29**	**19**	**16**	3	**42**	44	56	23	6	11	62	16	**68**	46	16	10	21	52	40	32
Ladicky et al. (2007)	**78**	6	0	0	0	0	9	5	10	1	2	11	0	6	6	29	2	2	0	11	1	9
Pantofaru et al. (2008)	59	**27**	1	8	2	1	32	14	14	4	8	32	9	24	15	**81**	11	26	1	28	17	20

Conclusions

- A novel approach for combining different segmentations to obtain a better segmentation
- A novel approach for combining classification results from several segments to better recognize objects.
- Superpixels don't provide the best level of representation of the objects.

[1] Caroline Pantofaru, Cordelia Schmid, and Martial Hebert. Object recognition by integrating multiple image segmentations. In European Conference on Computer Vision, volume III, pages 481–494, 2008.
[2] B. Fulkerson, A. Vedaldi, and S. Soatto. Class segmentation and object localization with superpixel neighborhoods. In Proc. ICCV, 2009.