targetfish

PROJECT

Targeted disease prophylaxis in European fish farming
(October 2012 – October 2017)

By developing a targeted vaccination strategy, TargetFish will prevent important fish diseases in European aquaculture industry.

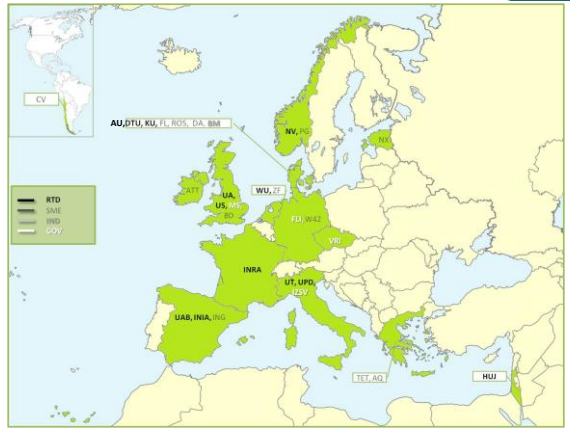
TargetFish is a large collaborative project funded by the European Commission under the 7th Framework Programme for Research and Technological Development.

TargetFish brings together leading European research groups that are experts on the fish immune system and enterprises from the Biotech and Veterinary sectors to advance the development of vaccines against important viral or bacterial pathogens in European aquaculture.

THE MAIN OBJECTIVES OF THE PROJECT ARE:

1. to generate a knowledge- and technology-base for rational development of next generation fish vaccines by studying antigens and adjuvants for mucosal routes of administration
2. to validate knowledge of immune responses for monitoring vaccine efficacy and safety, including issues associated with DNA vaccines
3. to approach implementation of prototype vaccines by optimizing vaccination strategies, thus shortening the route to exploitation

PARTICIPANTS



PARTNERS - RTD

P1 Wageningen Universiteit (WU), The Netherlands - *dr. Geert Wiegertjes, dr. Maria Forlenza*

P2 Aarhus Universitet (AU), Denmark – *dr. Niels Lorenzen*

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P6 Instituto Nacional De Investigacion Y Tecnologia Agraria Y Alimentaria (INIA), Spain – *dr. Carolina Tafalla*

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PARTNERS - RTD

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P14 Výzkumný ústav veterinárního lékařství (VRI), Czech Republic – *dr. Tomás Vesely*

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P16 University of Murcia (UM), Spain – *dr. Victor Mulero*

PARTNERS - SME & IND

P17 Tethys Aquaculture Limited (TET), UK – *dr. Patrick Smith*

P18 PatoGen Analyses AS (PG), Norway – *dr. Vidar Aspehaug*

P19 Fishlab (FL), Denmark – *dr. Kirsten Engell-Sørensen*

P20 Naxo OÜ (NX), Estonia – *dr. Juri Sober*

P21 Ridgeway Biologicals (RBL), United Kingdom – *dr. Tim Wallis*

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P23 Ingeniatrics Tecnologias S.L. (ING), Spain – *dr. Maria Flores*

P24 BigDNA (BD), United Kingdom – *dr. John March*

P25 W42 Industrial Biotechnology GmbH (W42), Germany – *dr. Ansgar Stratmann*

PARTNERS – SME & IND

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P28 Dansk akvakultur forening (DA), Denmark - *dr. Niels Henrik Henriksen*

P29 BioMar A/S (BM), Denmark – *dr. Trygve Sigholt* (IND)

P30 Bionaturis (BN), Spain – *dr. Ana de las Heras*

Organisational structure
STEERING COMMITTEE


Carolina Tafalla


Patrick Smith


Geert Wiegertjes


Niels Lorenzen

MAJOR FISH SPECIES IN EUROPE

Atlantic salmon

Atlantic salmon (*Salmo salar*) is the most cultivated fish species in Europe.

Rainbow trout

The production of rainbow trout (*Oncorhynchus mykiss*) has grown exponentially since its introduction in the 1950s in Europe.

Common carp

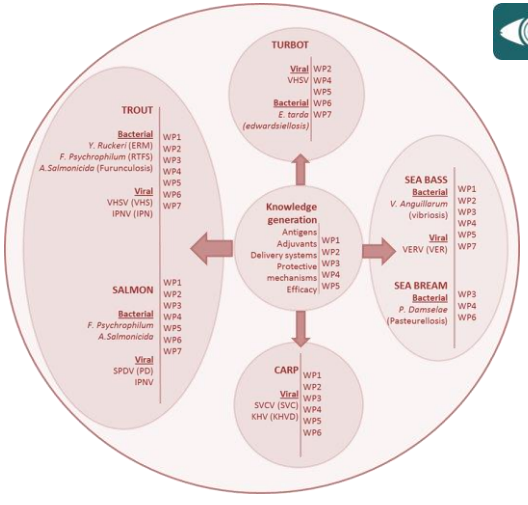
Common carp (*Cyprinus carpio*) is worldwide the most cultured fish species for food consumption (FAO, 2009).

European sea bass and gilthead seabream

The European sea bass (*Dicentrarchus labrax*) and gilthead seabream (*Sparus aurata*) are the most important farmed marine species in south Europe.

Turbot

Europe is the main world producer of turbot (*Psetta maxima*).



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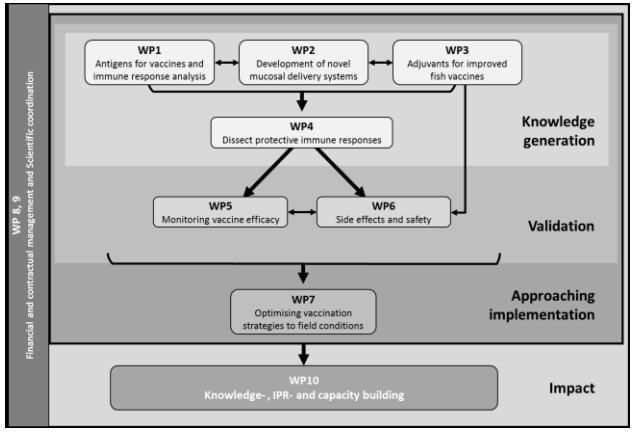

RESEARCH

Initial work packages (WP) study relevant antigens, novel (oral) systems to deliver these antigens to (mucosal) body sites and adjuvants to improve antigenicity or duration of immunity.

Subsequent WPs study prototype vaccines which will be validated for efficacy by in vivo challenges and in vitro assays, and for minimal side effects and maximal safety. Vaccination protocols will be scrutinized against use under field conditions.

An Industry Forum will shape the discussion between policy makers, scientists and industry.

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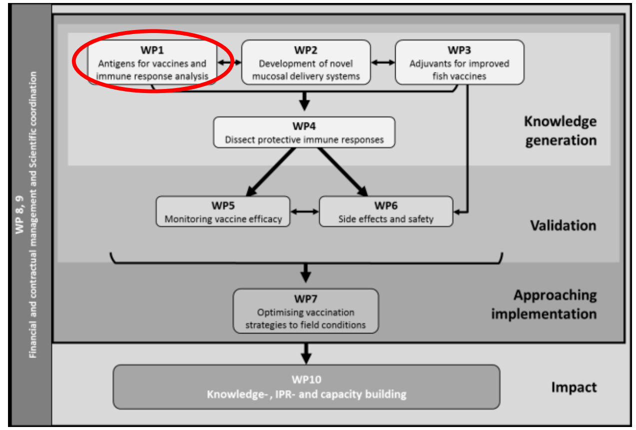

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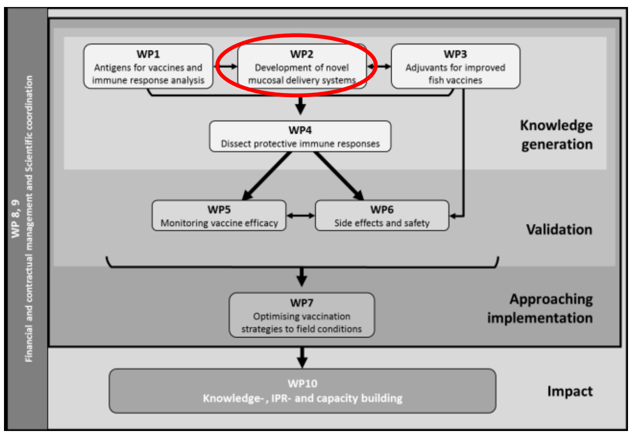

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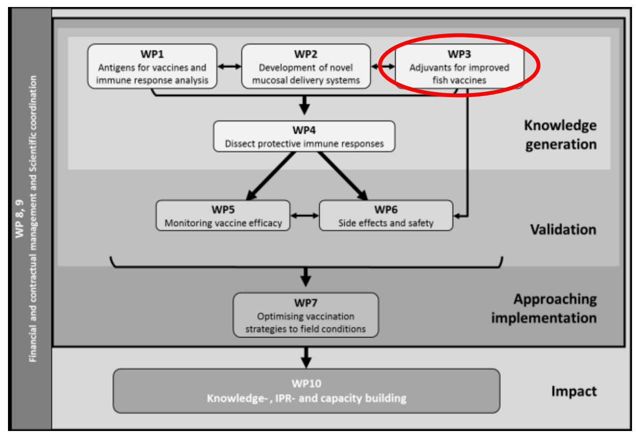

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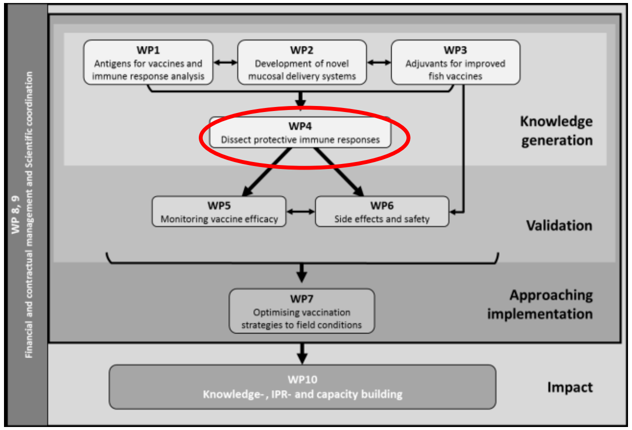

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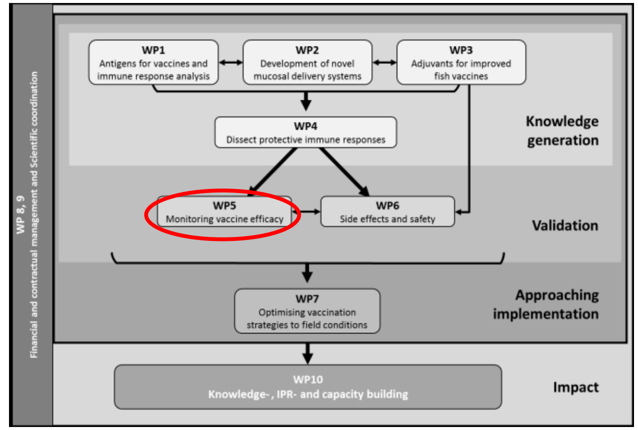

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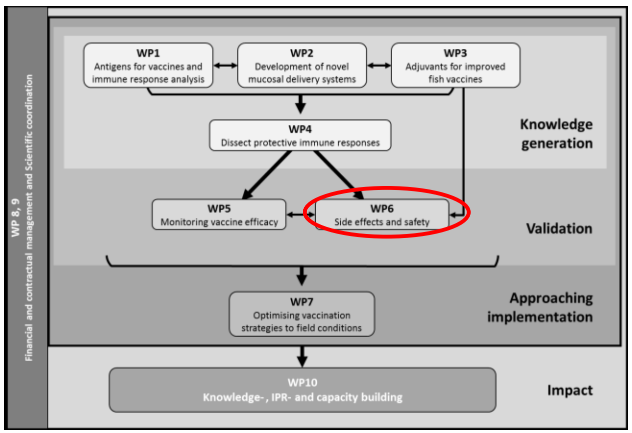

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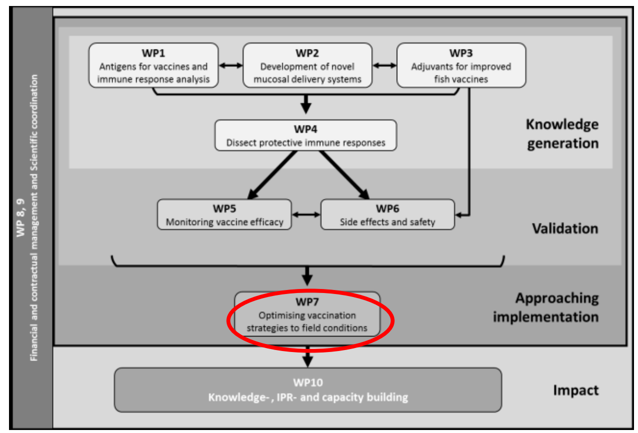
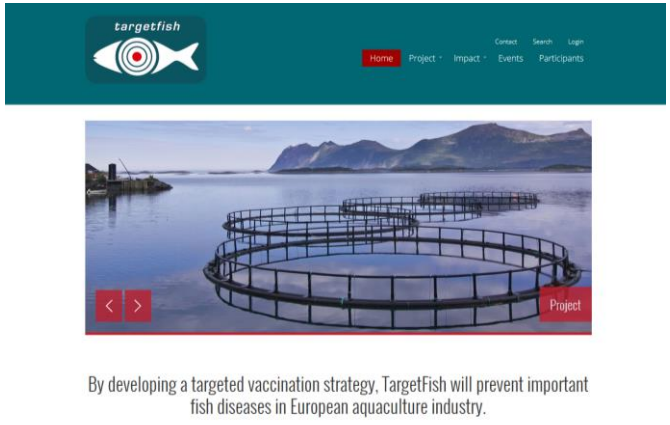


IMPLEMENTATION

The Industry Forum will be the interface for interaction between academic community and fish health industry. Several vaccine-developing companies already are partners involved in the work performed on fish vaccines.
The first Industrial Platform meeting was held at the International Conference of the European Association of Fish Pathologists (EAFP), September 2013.

If you have got questions regarding the Industry Form please contact Professor Patrick Smith at:
patrick.tethysaquaculture@gmail.com

Newsletters
For subscription to the newsletter send an email to:
targetfish.cbi@wur.nl



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www.targetfish.eu

VISIT AT SEPPIC

During the Training on adjuvants, held from February 4-6, several Targetfish partners were trained at the production site of Seppic on the manufacturing and quality control of adjuvants for use in fish vaccines.

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Thank you for your attention ☺