

Summarized Biographical Sketch Daniel Choquet

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| First class research Director at the CNRS, Born 1962 | | |
| Ingénieur de l'Ecole Centrale de Paris, | 1981-1984 | General Engineering |
| Pasteur Institute, Paris | Ph.D. 1984-1988 | Pharmacology |
| Bordeaux University | Habilitation 1997 | Neuroscience |

A. Education

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| 1997 | Habilitation à diriger des recherches, Bordeaux University. |
| 1994-1996 | Sabbatical stay at Duke University (N.C., USA) Supervisor Pr. M.P. Sheetz. EMBO Fellow. |
| 1990 | Post-doctoral stay at Irvine University (CA, USA) Supervisor Pr. M. Cahalan. |
| 1988 | PhD : Paris VI University. Option Pharmacology. Supervisor Dr. H. Korn, Institut Pasteur. "Control of potassium channels in lymphocytes by hormones and second messengers". |
| 1984 | Diploma from the Ecole Centrale des Arts et Manufactures de Paris, Option Bio-engineering. |

B. Professional Experience

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| 2011- | Director of the Institute for Interdisciplinary Neuroscience, UMR 5297 CNRS-Université Bordeaux Segalen |
| 2007-2010 | Adjunct director of the laboratory Cellular Physiology of Synapses, UMR 5091. |
| 1999-present | Group leader at the CNRS, UMR 5091, laboratory "Cellular Physiology of Synapses", Bordeaux University. |
| 1998-present | Research director at the CNRS. |
| 1996-1999 | Junior group leader at the CNRS/ Bordeaux University laboratory "Neuronal interactions" UMR 5541. Recipient of an ATIP Grant. |
| 1988-1998 | Research officer at the CNRS. |

C. Honors

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| 2010 | Member of the French Academy of Science |
| 2010 | Prix de la découverte science, Académie Nationale des Sciences, Belles-Lettres et Arts de Bordeaux |
| 2009 | Silver Medal from the CNRS |
| 2009 | Advanced ERC grant from the European commission |
| 2007 | Bauer Lectureship award, Brandeis University |
| 2004 | Grand prix from the French Academy of Sciences, prix du CEA. |
| 2002 | Pierre-Bois Lectureship award, McGill University |
| 1997 | Research prize from the « Fondation pour la Recherche Médicale » |
| 1996-1999 | Recipient of an ATIP Grant. |
| 1994-1996 | Fellowship from EMBO. |
| 1994 | Prize from the « société de secours des amis de la science » |
| 1994 | Petit-Dormoy prize from the French Academy of Sciences |
| 1990 | Bronze medal from the CNRS |
| 1988 | Fellowship from the Association pour la Recherche contre le Cancer. |
| 1984-1988 | PhD-engineer fellowship from the French ministry of research. |
| 1984-1989 | |

D. Administrative functions

- 2011- Member of the strategic scientific committee of "Institut du Cerveau et de la Moelle", Paris
- 2009- present: Member of the scientific advisory board of the Curie Institute, Paris.
- 2008-present: Member of the scientific advisory board of the ICeMS, Kyoto.
- 2008-present: Member of the ANR steering committee
- 2007-present: Adjunct director of the laboratory UMR 5091.
- 2003-2006: Member of the scientific selection comity of the Human Frontier Science Program.
- 2002-2004 : Elected member of the 43rd interdisciplinary study section of the Comity for National Research ("Physic and chemistry for the study of biological assemblies").
- 2001-2009: Scientific director of the cellular imaging core facility, "PICIN", Bordeaux University.
<http://www.PICIN.u-bordeaux2.fr>
- 2002-present: Consultant for Amplitude system
- 2001-present: Member of the specialist commission 69 ("neurosciences") of the National University Comity.
- 2001-2003: Member of the steering comity of the interdisciplinary program "Dynamics and Reactivity of Biological Assemblies" of the CNRS and ministry of research.
- 2001-2003: Member of the steering comity of the interdisciplinary program "Individual Nano Objects" of the CNRS and ministry of research.
- 2000-2004: Nominated member of the 25th study section of the Comity for National Research ("cellular interactions"). Nominated member of the board.
- 1999-present: Group leader at the CNRS unit 5091. "Dynamic organization of membrane proteins".
- 1996-1999: Junior group leader ATIP at the CNRS.

E. Referee activity

- Referee for journals: Nature, Science, Nature Neuroscience, Neuron, PNAS, Biophysical J., J. Cell Science, J. Neuroscience, EMBO Journal.
- Referee for the institutions: National Science Foundation, Human Frontier Science Program, MRC, INSERM. External expert for the University of Rehovot, Israel, the University of Leyden, the Netherland.

F. Peer-reviewed publications

1. Brachet, A., Leterrier, C., Irondelle, M., Fache, M.P., Racine, V., Sibarita, J.B., **Choquet, D.**, and Dargent, B. (2010). Ankyrin G restricts ion channel diffusion at the axonal initial segment before the establishment of the diffusion barrier. *The Journal of cell biology* 191, 383-395.
2. **Choquet, D.** (2010). Fast AMPAR trafficking for a high-frequency synaptic transmission. *The European journal of neuroscience* 32, 250-260.
3. Giannone, G., Hosy, E., Levet, F., Constals, A., Schulze, K., Sobolevsky, A.I., Rosconi, M.P., Gouaux, E., Tampe, R., **Choquet, D.**, and Cognet, L. (2010). Dynamic Superresolution Imaging of Endogenous Proteins on Living Cells at Ultra-High Density. *Biophysical journal* 99, 1303-1310.
4. Groc, L., Bard, L., and **Choquet, D.** (2009). Surface trafficking of N-methyl-D-aspartate receptors: physiological and pathological perspectives. 158, 4-18.
5. Groc, L., and **Choquet, D.** (2009). [The neuronal surface: a **Neuroscience** new land to regulate neuronal communication]. *Med Sci (Paris)* 25, 895-897.
6. Gundelfinger, E.D., Frischknecht, R., **Choquet, D.**, and Heine, M. (2010). Converting juvenile into adult plasticity: a role for the brain's extracellular matrix. *The European journal of neuroscience* 31, 2156-2165.
7. Opazo, P., and **Choquet, D.** (2010). A three-step model for the synaptic recruitment of AMPA receptors. *Mol Cell Neurosci*.

8. Opazo, P., Labrecque, S., Tigaret, C.M., Frouin, A., Wiseman, P.W., De Koninck, P., and **Choquet, D.** (2010). CaMKII Triggers the Diffusional Trapping of Surface AMPARs through Phosphorylation of Stargazin. **Neuron** 67, 239-252.
9. Renner, M.L., Cognet, L., Lounis, B., Triller, A., and **Choquet, D.** (2009). The excitatory postsynaptic density is a size exclusion diffusion environment. *Neuropharmacology* 56, 30-36.
10. Rust, M.B., Gurniak, C.B., Renner, M., Vara, H., Morando, L., Gorlich, A., Sassoe-Pognetto, M., Banchaabouchi, M.A., Giustetto, M., Triller, A., et al. (2010). Learning, AMPA receptor mobility and synaptic plasticity depend on n-cofilin-mediated actin dynamics. **Embo J** 29, 1889-1902.
11. Saint-Michel, E., Giannone, G., Choquet, D., and Thoumine, O. (2009). Neurexin/neuroigin interaction kinetics characterized by counting single cell-surface attached quantum dots. **Biophysical journal** 97, 480-489.
12. Tigaret, C., and Choquet, D. (2009). Neuroscience. More AMPAR garnish. *Science* 323, 1295-1296.
13. Frischknecht⁺ R., Heine⁺ M., Perrais, D., Seidenbecher, C.I., **Choquet⁺ D.**, Gundelfinger⁺ E.D., ⁺equal contribution, (2009). The brain extracellular matrix limits lateral diffusion of AMPA receptors and modulates short-term synaptic plasticity. **Nature Neuroscience** 31 May 2009, doi:10.1038/nn.2338, .
14. Michaluk, P., Mikasova, L., Groc, L., Frischknecht, R., **Choquet, D.**, and Kaczmarek, L. (2009). Matrix metalloproteinase-9 controls NMDA receptor surface diffusion through integrin beta1 signaling. **J Neurosci** 29, 6007-6012.
15. Petrini, E.M., Lu, J., Cognet, L., Lounis, B., Ehlers, M.D., and **Choquet, D.** (2009). Endocytic trafficking and recycling maintain a pool of mobile surface AMPA receptors required for synaptic potentiation. **Neuron** 63, 92-105.
16. Renner, M., **Choquet, D.**, and Triller, A. (2009). Control of the postsynaptic membrane viscosity. **J Neurosci** 29, 2926-2937.
17. Groc, L., **Choquet, D.**, and Chaouloff, F. (2008). The stress hormone corticosterone conditions AMPAR surface trafficking and synaptic potentiation. **Nat Neurosci** 11, 868-870.
18. Heine, M., Groc, L., Frischknecht, R., Beique, J.C., Lounis, B., Rumbaugh, G., Huganir, R.L., Cognet, L., and **Choquet, D.** (2008). Surface mobility of postsynaptic AMPARs tunes synaptic transmission. **Science** 320, 201-205.
19. Heine, M., Thoumine, O., Mondin, M., Tessier, B., Giannone, G., and **Choquet, D.** (2008). Activity-independent and subunit-specific recruitment of functional AMPA receptors at neurexin/neuroigin contacts. **Proceedings of the National Academy of Sciences of the United States of America** 105, 20947-20952.
20. Mikasova, L., Groc, L., **Choquet, D.**, and Manzoni, O.J. (2008). Altered surface trafficking of presynaptic cannabinoid type 1 receptor in and out synaptic terminals parallels receptor desensitization. **Proceedings of the National Academy of Sciences of the United States of America** 105, 18596-18601.
21. Thoumine, O., Ewers, H., Heine, M., Groc, L., Frischknecht, R., Giannone, G., Poujol, C., Legros, P., Lounis, B., Cognet, L., and **Choquet, D.** (2008). Probing the dynamics of protein-protein interactions at neuronal contacts by optical imaging. **Chem Rev** 108, 1565-1587.
22. Triller, A., and **Choquet, D.** (2008). New concepts in synaptic biology derived from single-molecule imaging. **Neuron** 59, 359-374.
23. **Choquet, D.**, and Triller, A. (2008). Surface Trafficking of Membrane Proteins at Excitatory and Inhibitory Synapses. In *Synapse structure and function*, M. Ehlers, and J. Hell, eds. (in press).
24. Saglietti, L., Dequidt, C., Kamieniarz, K., Rousset, M.C., Valnegri, P., Thoumine, O., Beretta, F., Fagni, L., **Choquet, D.**, Sala, C., et al. (2007). Extracellular Interactions between GluR2 and N-Cadherin in Spine Regulation. *Neuron* 54, 461-477.
25. Groc, L., Lafourcade, M., Heine, M., Renner, M., Racine, V., Sibarita, J.B., Lounis, B., **Choquet, D.**, and Cognet, L. (2007). Surface trafficking of neurotransmitter receptor: comparison between single-molecule/quantum dot strategies. *J Neurosci* 27, 12433-12437.
26. Groc, L., **Choquet, D.**, Stephenson, F.A., Verrier, D., Manzoni, O.J., and Chavis, P. (2007). NMDA receptor surface trafficking and synaptic subunit composition are developmentally regulated by the extracellular matrix protein Reelin. *J Neurosci* 27, 10165-10175.
27. Ehlers, M.D., Heine, M., Groc, L., Lee, M.C., and **Choquet, D.** (2007). Diffusional Trapping of GluR1 AMPA Receptors by Input-Specific Synaptic Activity. *Neuron* 54, 447-460.

28. Dequidt, C., Danglot, L., Alberts, P., Galli, T., **Choquet, D.**, and Thoumine, O. (2007). Fast turnover of L1 adhesions in neuronal growth cones involving both surface diffusion and exo/endocytosis of L1 molecules. *Molecular biology of the cell* 18, 3131-3143.
29. Coussen, F., and **Choquet, D.** (2007). Neuroscience: wrestling with SUMO. *Nature* 447, 271-272.
30. Breillat, C., Thoumine, O., and **Choquet, D.** (2007). Characterization of SynCAM surface trafficking using a SynCAM derived ligand with high homophilic binding affinity. *Biochem Biophys Res Commun* 359, 655-659.
31. Bats, C., Groc, L., and **Choquet, D.** (2007). The interaction between Stargazin and PSD-95 regulates AMPA receptor surface trafficking. *Neuron* 53, 719-734.
32. Thoumine, O., Lambert, M., Mege, R.M., and **Choquet, D.** (2006). Regulation of N-cadherin dynamics at neuronal contacts by ligand binding and cytoskeletal coupling. *Molecular biology of the cell* 17, 862-875.
33. Legros, P., **Choquet, D.**, Gueguen, S., Mottay, E.P., and Deguil, N. (2006). Simultaneous excitation of multiple fluororophores with a compact femtosecond laser. *Proceedings of the SPIE* 6089, 135-140.
34. Lasne, D., Blab, G.A., Berciaud, S., Heine, M., Groc, L., **Choquet, D.**, Cognet, L., and Lounis, B. (2006). Single nanoparticle photothermal tracking (SNaPT) of 5-nm gold beads in live cells. *Biophysical journal* 91, 4598-4604.
35. Groc, L., Heine, M., Cousins, S.L., Stephenson, F.A., Lounis, B., Cognet, L., and **Choquet, D.** (2006). NMDA receptor surface mobility depends on NR2A-2B subunits. *Proceedings of the National Academy of Sciences of the United States of America* 103, 18769-18774.
36. Groc, L., Heine, M., Cognet, L., Lounis, B., and **Choquet, D.** (2006). Lateral diffusion of excitatory neurotransmitter receptors during synaptogenesis. *Molecular Mechanisms of Synaptogenesis* Publisher: Springer U.S.A., New York., 221-232.
37. Groc, L., and **Choquet, D.** (2006). AMPA and NMDA glutamate receptor trafficking: multiple roads for reaching and leaving the synapse. *Cell Tissue Res* 326, 423-438.
38. Cognet, L., Groc, L., Lounis, B., and **Choquet, D.** (2006). Multiple routes for glutamate receptor trafficking: surface diffusion and membrane traffic cooperate to bring receptors to synapses. *Sci STKE* 2006, pe13.
39. Triller, A., and **Choquet, D.** (2005). Surface trafficking of receptors between synaptic and extrasynaptic membranes: and yet they do move! *Trends Neurosci* 28, 133-139.
40. Thoumine, O., Saint-Michel, E., Dequidt, C., Falk, J., Rudge, R., Galli, T., Faivre-Sarrailh, C., and **Choquet, D.** (2005). Weak effect of membrane diffusion on the rate of receptor accumulation at adhesive contacts. *Biophysical journal* 89, L40-42.
41. Groc, L., **Choquet, D.**, Lounis, B., and Cognet, L. (2005). Single-molecule detection: Unravelling surface receptor diffusion in live neurons. *The Biochemist* Oct 2005, 5-8.
42. Cognet, L., Lounis, B., and **Choquet, D.** (2005). Tracking receptors by optical imaging of single molecules. In *Imaging in Neuroscience and Development : A Laboratory Manual* (Cold Spring Harbor, NY, Cold Spring Harbor Lab Press), p. 521.
43. Legros, P., **Choquet, D.**, Mottay, E.P., Deguil, N., and Salin, F. (2004). Comparative analysis of infrared fluorescence generation in multiphoton spectroscopy. *Proc SPIE* 5323, 314-318.
44. Groc, L., Heine, M., Cognet, L., Brickley, K., Stephenson, F.A., Lounis, B., and **Choquet, D.** (2004). Differential activity-dependent regulation of the lateral mobilities of AMPA and NMDA receptors. *Nat Neurosci* 7, 695-696.
45. Falk, J., Thoumine, O., Dequidt, C., **Choquet, D.**, and Faivre-Sarrailh, C. (2004). NrCAM coupling to the cytoskeleton depends on multiple protein domains and partitioning into lipid rafts. *Molecular biology of the cell* 15, 4695-4709.
46. Deguil, N., Mottay, E., Salin, F., Legros, P., and **Choquet, D.** (2004). Novel diode-pumped infrared tunable laser system for multi-photon microscopy. *Microsc Res Tech* 63, 23-26.
47. Triller, A., and **Choquet, D.** (2003). Synaptic structure and diffusion dynamics of synaptic receptors. *Biol Cell* 95, 465-476.
48. Tardin, C., Cognet, L., Bats, C., Lounis, B., and **Choquet, D.** (2003). Direct imaging of lateral movements of AMPA receptors inside synapses. *Embo J* 22, 4656-4665.
49. Serge, A., Fourgeaud, L., Hemar, A., and **Choquet, D.** (2003). Active surface transport of metabotropic glutamate receptors through binding to microtubules and actin flow. *J Cell Sci* 116, 5015-5022.

50. Deguil, N., Mottay, E., Salin, F., and **Choquet, D.** (2003). A novel diode-pumped tunable system for multiphoton microscopy. *Proc SPIE* 5139, 36-41.
51. Cognet, L., Tardin, C., Boyer, D., **Choquet, D.**, Tamarat, P., and Lounis, B. (2003). Single metallic nanoparticle imaging for protein detection in cells. *Proceedings of the National Academy of Sciences of the United States of America* 100, 11350-11355.
52. **Choquet, D.**, and Triller, A. (2003). The role of receptor diffusion in the organization of the postsynaptic membrane. *Nat Rev Neurosci* 4, 251-265.
53. Adami, R., Cintio, O., Trombetta, G., **Choquet, D.**, and Grazi, E. (2003). On the stiffness of the natural actin filament decorated with alexa fluor tropomyosin. *Biophys Chem* 104, 469-476.
54. Serge, A., Fourgeaud, L., Hemar, A., and **Choquet, D.** (2002). Receptor activation and homer differentially control the lateral mobility of metabotropic glutamate receptor 5 in the neuronal membrane. *J Neurosci* 22, 3910-3920.
55. Lambert, M., **Choquet, D.**, and Mege, R.M. (2002). Ligand-induced mobilization of cadherins triggers their anchoring to the actin cytoskeleton through a Rac1-dependent process. *J. Cell Biol.* 157, 469-479.
56. Lambert, M., **Choquet, D.**, and Mege, R.M. (2002). Dynamics of ligand-induced, Rac1-dependent anchoring of cadherins to the actin cytoskeleton. *The Journal of cell biology* 157, 469-479.
57. Coussen, F., Normand, E., Marchal, C., Costet, P., **Choquet, D.**, Lambert, M., Mege, R.M., and Mulle, C. (2002). Recruitment of the kainate receptor subunit glutamate receptor 6 by cadherin/catenin complexes. *J Neurosci* 22, 6426-6436.
58. Coussen, F., **Choquet, D.**, Sheetz, M.P., and Erickson, H.P. (2002). Trimers of the fibronectin cell adhesion domain localize to actin filament bundles and undergo rearward translocation. *J Cell Sci* 115, 2581-2590.
59. Cognet, L., Coussen, F., **Choquet, D.**, and Lounis, B. (2002). Fluorescence microscopy of single autofluorescent proteins for cellular biology. *Compte Rendus Physique* 3, 645-656.
60. Borgdorff, A.J., and **Choquet, D.** (2002). Regulation of AMPA receptor lateral movements. *Nature* 417, 649-653.
61. Adami, R., Cintio, O., Trombetta, G., **Choquet, D.**, and Grazi, E. (2002). Effects of Chemical Modification, Tropomyosin, and Myosin Subfragment 1 on the Yield Strength and Critical Concentration of F-Actin. *Biochemistry* 41, 5907-5912.
62. Meier, J., Vannier, C., Sergé, A., Triller, A., and **Choquet, D.** (2001). Fast and reversible trapping of surface glycine receptors by gephyrin. *Nature Neuroscience* 4, 253-260.
63. Cintio, O., Adami, R., **Choquet, D.**, and Grazi, E. (2001). On the elastic properties of tetramethylrhodamine F-actin. *Biophys Chem* 92, 201-207.
64. **Choquet, D.**, and Hémar, A. (2000). Homer : le produit d'un gène précoce intervient dans le fonctionnement et la structure des synapses glutamatergiques. *Médecine Science* 16, 440-443.
65. Sheetz, M.P., Felsenfeld, D., Galbraith, C.G., and **Choquet, D.** (1999). Cell migration as a five-step cycle. *Biochem Soc Symp* 65, 233-243.
66. Adami, R., **Choquet, D.**, and Grazi, E. (1999). Rhodamine phalloidin F-actin: critical concentration versus tensile strength. *Eur J Biochem* 263, 270-275.
67. **Choquet, D.**, Felsenfeld, D.P., and Sheetz, M.P. (1997). Extracellular matrix rigidity causes strengthening of integrin- cytoskeleton linkages. *Cell* 88, 39-48.
68. Felsenfeld, D.P., **Choquet, D.**, and Sheetz, M.P. (1996). Ligand binding regulates the directed movement of beta1 integrins on fibroblasts. *Nature* 383, 438-440.
69. Cassard, S., **Choquet, D.**, Fridman, W.H., and Bonnerot, C. (1996). Regulation of ITAM signaling by specific sequences in Ig- β BCR subunit. *Journal of biological Chemistry* 271, 23786-23791.
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71. Le Deist, F., Hivroz, C., Partiseti, M., Rieux-Laucat, F., Debatin, K.M., **Choquet, D.**, De Villartay, J.P., and Fischer, A. (1995). T cell activation deficiencies. *Clinical Immunology & Immunopathology* 76, S163-164.
72. Drakopoulou, E., Cotton, J., Virelizier, H., Bernardi, E., Schoofs, A.R., Partiseti, M., **Choquet, D.**, Gurrola, G., Possani, L.D., and Vita, C. (1995). Chemical Synthesis, Structural and Functional

Characterisation Of Noxiustoxin, a Powerful Blocker Of Lymphocyte Voltage-Dependent K⁺ Channels. *Biochemical & Biophysical Research Communications* 213, 901-907.

73. Partiseti, M., Le Deist, F., Hivroz, C., Fischer, A., Korn, H., and **Choquet, D.** (1994). The calcium current activated by T cell receptor and store depletion in human lymphocytes is absent in a primary immunodeficiency. *Journal of Biological Chemistry* 269, 32327-32335.
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75. **Choquet, D.**, Ku, G., Cassard, S., Malissen, B., Korn, H., Fridman, W.H., and Bonnerot, C. (1994). Different patterns of calcium signaling triggered through two components of the B lymphocyte antigen receptor. *Journal of Biological Chemistry* 269, 6491-6497.
76. **Choquet, D.**, and Partiseti, M. (1994). Ion channels in B lymphocytes (editorial). *Pathologie Biologie* 42, 279-285.
77. Partiseti, M., Korn, H., and **Choquet, D.** (1993). Pattern of potassium channel expression in proliferating B lymphocytes depends upon the mode of activation. *Journal of Immunology* 151, 2462-2470.
78. **Choquet, D.**, Partiseti, M., Amigorena, S., Bonnerot, C., Fridman, W.H., and Korn, H. (1993). Cross-linking of IgG receptors inhibits membrane immunoglobulin-stimulated calcium influx in B lymphocytes. *Journal of Cell Biology* 121, 355-363.
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83. Bonnerot, C., Amigorena, S., **Choquet, D.**, Pavlovich, R., Choukroun, V., and Fridman, W.H. (1992). Role of associated gamma-chain in tyrosine kinase activation via murine Fc gamma RIII. *EMBO Journal* 11, 2747-2757.
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86. Amigorena, S., **Choquet, D.**, Teillaud, J.L., Korn, H., and Fridman, W.H. (1990). Ion channel blockers inhibit B cell activation at a precise stage of the G1 phase of the cell cycle. Possible involvement of K⁺ channels. *Journal of Immunology* 144, 2038-2045.
87. Amigorena, S., **Choquet, D.**, Teillaud, J.L., Korn, H., and Fridman, W.H. (1990). Ion channels and B cell mitogenesis. *Molecular Immunology* 27, 1259-1268.
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C. Ongoing Research Support:

Conseil Régional d'Aquitaine
Equipement grant : 01/01/010-31/12/112

ERA-NET NEURON FP7: 2009-2012
Development of new chemical and optical tools to study and modulate glutamate receptor surface trafficking in synaptic transmission in different models of neurodegenerative diseases. D. Choquet (Coordinator)/ B Bioulac/R Tampé/E Gundelfinger/L Kazmarek.

Projet International de Coopération Scientifique (PICS): 2009-2010
Probing Nanoscale Architecture and Dynamics at Synapses. Daniel Choquet, Coordinator. Co-investigators: Brahim Lounis, CPMOH, France; Michael D. Ehlers, Duke University, USA, Richard Weinberg, Chappel Hill, USA

ANR Blanche "Chem-Traffic" 2009-2012 :
Development and exploitation of new chemical tools to investigate synaptic plasticity D. Choquet.

Advanced Research Grant ERC: "Nano-Dyn-Syn" 2009-2013.
D. Choquet Coordinateur. Nano-Scale Organization Dynamics and Functions of Synapses: from single molecule tracking to the physiopathology of excitatory synaptic transmission

ANR Neuroscience "Stim-Traf-Park" 2008-2010
B. Bioulac/ D. Choquet. Properties and impact of AMPAR surface diffusion in deep brain stimulation response of STN-SNr synapses in normal and Parkinson models

Conseil Régional d'Aquitaine 01/01/07-31/12/10
Micro-Cor: correlative microscopy of synaptic function - The main goal of this proposal is to develop ultra high resolution imaging techniques and correlate EM and optical data.

French National Research Agency Neuroscience 01/06/07-31/06/10
Dynamics and function of neuroligin/neurexin adhesive contacts as a trigger of synaptogenesis

Completed Research Support

Fondation pour la Recherche Médicale: 2009
program grant for equipment of core facilities

Human Frontier Science Program Grant 01/09/06-31/08/08
Spatiotemporal dynamics and macromolecular organization of synaptic proteins.

Fondation pour la Recherche Médicale 01/09/06-31/08/08
Dynamic imaging of glutamate receptors, control of neuronal excitotoxicity by the regulation of receptor-scaffold protein interactions.

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| European Community Grant GRIPANT Glutamate Receptor Interacting Proteins as Novel Neuroprotective Targets | 01/09/06-31/08/08 |
| French National Research Agency Neuroscience Spatiotemporal dynamics and macromolecular organization of proteins at excitatory and inhibitory synapses | 01/09/06-31/08/08 |
| Conseil Régional d'Aquitaine Nano-Neuro-Imagerie - Developement of new nano-particles for single molecule approaches | 01/09/06-31/08/07 |
| Conseil Régional d'Aquitaine Equipment for the imaging core facility | 01/09/06-31/08/07 |
| Association Française contre les Myopathies Dynamic imaging of glutamate receptor-scaffold protein interactions in glutamate induced neuronal death | 01/09/06-31/08/07 |
| Conseil Régional d'Aquitaine Nouvelles approches d'imagerie pour l'étude de l'organisation et de la dynamique des membranes biologiques | 01/09/04-31/08/06 |
| French ministry of research program grant DRAB Architecture macromoléculaire des récepteurs NMDA. Etude par trois méthodes fluorométriques : fluorescence de molécules uniques, transfert d'énergie et BiFC (Bimolecular Fluorescence Complementation). | 01/09/03-31/08/05 |
| French ministry of research program grant ACI BCMS Trafic juxtamembranaire des protéines synaptiques : dynamique et interactions moléculaires | 01/09/03-31/08/05 |
| Fédération des recherches sur le Cerveau : Dynamique du contrôle du trafic des récepteurs au glutamate par la dopamine : une étude en temps réel par imagerie sur tissus et cellules vivantes. | |
| European community Grant KAR-TRAP Kainate and AMPA receptor trafficking. | 01/09/01-31/08/04 |
| Conseil Régional d'Aquitaine Diffusion de biomolécules uniques marquées dans des membranes modèles et dans des neurones vivants | 01/09/01-31/08/04 |
| CNRS ATIPE young investigator Grant | 01/09/99-31/08/02 |