Stanford

John R. Pringle

Professor of Genetics

Curriculum Vitae available Online

Bio

ACADEMIC APPOINTMENTS

- Professor, Genetics
- Member, Bio-X

PROFESSIONAL EDUCATION

- Ph.D., Harvard University , Biology (1971)
- A.B., Harvard University , Mathematics (1963)

LINKS

- Pringle Lab website: http://pringlelab.stanford.edu/

Research & Scholarship

CURRENT RESEARCH AND SCHOLARLY INTERESTS

Much of the research in the Pringle laboratory exploits the power of yeast as an experimentally tractable model eukaryote to investigate fundamental problems in cell and developmental biology such as the mechanisms of cell polarization and cytokinesis. In regards to cell polarization, the major current foci are the roles of cortical marker proteins and of a GTPase-based signal-transduction cascade in the selection of the polarization axes (as defined by the bud sites). Interestingly, the marker proteins appear to be delivered to polarized sites in the cell surface by an unconventional arm of the secretory pathway. In regards to cytokinesis, the major current foci are the roles of the septin proteins and the interactions among the actomyosin contractile ring, the enzymes of extracellular-matrix (cell-wall) synthesis, and proteins that appear to be involved in plasma-membrane reorganization. Our working hypothesis is that the conserved core mechanism is the rearrangements of the membrane during cleavage-furrow formation and that the actomyosin ring and extracellular matrix play accessory roles.

In a departure from our many years of yeast work, a major new project involves developing the small sea anemone Aiptasia pallida as a model system for study of the molecular and cellular biology of the dinoflagellate-cnidarian symbiosis, which is critical for the survival of most reef-building corals but still very poorly understood. Processes to be investigated include the recognition and signaling events involved in symbiosis establishment, the temporal and spatial coordination of symbiont and host cell cycles during symbiosis maintenance, and the signaling and cellular processes involved in symbiosis breakdown under stress. Currently much of our effort is directed at genomic analysis and method development that will underpin later studies.

Teaching

COURSES

2020-21

- Advanced Genetics: GENE 205 (Win)

- Current Issues in Genetics: GENE 219 (Aut, Win, Spr)
- Frontiers in Biological Research: BIOC 215, DBIO 215, GENE 215 (Aut, Win, Spr)
- Genetics and Developmental Biology Training Camp: DBIO 200, GENE 200 (Aut)

2019-20

- Advanced Genetics: GENE 205 (Win)
- Current Issues in Genetics: GENE 219 (Aut, Win, Spr, Sum)
- Frontiers in Biological Research: BIOC 215, DBIO 215, GENE 215 (Aut, Win, Spr)
- Genetics and Developmental Biology Training Camp: DBIO 200, GENE 200 (Aut)

2018-19

- Advanced Genetics: GENE 205 (Win)
- Frontiers in Biological Research: BIOC 215, DBIO 215, GENE 215 (Aut, Win, Spr)
- Genetics and Developmental Biology Training Camp: DBIO 200, GENE 200 (Aut)

2017-18

- Advanced Genetics: GENE 205 (Win)
- Frontiers in Biological Research: BIOC 215, DBIO 215, GENE 215 (Aut, Win, Spr)

STANFORD ADVISEES

Doctoral Dissertation Reader (AC)

Nia Walker

Postdoctoral Faculty Sponsor

Phillip Cleves, Lorraine Ling, Christian Renicke, Gabe Rosenfield

GRADUATE AND FELLOWSHIP PROGRAM AFFILIATIONS

- Genetics (Phd Program)

Publications

PUBLICATIONS

- **Reduced thermal tolerance in a coral carrying CRISPR-induced mutations in the gene for a heat-shock transcription factor.** *Proceedings of the National Academy of Sciences of the United States of America*
  Cleves, P. A., Tinoco, A. I., Bradford, J., Perrin, D., Bay, L. K., Pringle, J. R.
  2020
- **Insights into coral bleaching under heat stress from analysis of gene expression in a sea anemone model system.** *Proceedings of the National Academy of Sciences of the United States of America*
  Cleves, P. A., Krediet, C. J., Lehnert, E. M., Onishi, M., Pringle, J. R.
  2020
- **Impact of menthol on growth and photosynthetic function of Breviolum minutum (Dinoflagellata, Dinophyceae, Symbiodiniaceae) and interactions with its Aiptasia host.** *Journal of phycology*
  Clowez, S., Renicke, C., Pringle, J. R., Grossman, A. R.
  2020
- **Cleavage-furrow formation without F-actin in Chlamydomonas.** *Proceedings of the National Academy of Sciences of the United States of America*
  Onishi, M., Umen, J. G., Cross, F. R., Pringle, J. R.
  2020

- **Symbiont population control by host-symbiont metabolic interaction in Symbiodiniaceae-cnidarian associations.** *Nature communications*
  Xiang, T., Lehnert, E., Jinkerson, R. E., Clowez, S., Kim, R. G., DeNofrio, J. C., Pringle, J. R., Grossman, A. R.
  2020; 11 (1): 108

- **F-actin homeostasis through transcriptional regulation and proteasome-mediated proteolysis.** *Proceedings of the National Academy of Sciences of the United States of America*
  Onishi, M., Pecani, K., Jones, T. 4., Pringle, J. R., Cross, F. R.
  2018

- **CRISPR/Cas9-mediated genome editing in a reef-building coral** *PROCEEDINGS OF THE NATIONAL ACADEMY OF SCIENCES OF THE UNITED STATES OF AMERICA*
  Clevesa, P. A., Strader, M. E., Bay, L. K., Pringle, J. R., Matz, M. V.
  2018; 115 (20): 5235–40

- **Role of the Hofl-Cyk3 interaction in cleavage-furrow ingression and primary-septum formation during yeast cytokinesis** *MOLECULAR BIOLOGY OF THE CELL*
  Wang, M., Nishihama, R., Onishi, M., Pringle, J. R.
  2018; 29 (5): 597–609

- **Glucose-Induced Trophic Shift in an Endosymbiont Dinoflagellate with Physiological and Molecular Consequences** *PLANT PHYSIOLOGY*
  Xiang, T., Jinkerson, R. E., Clowez, S., Tran, C., Krediet, C. J., Onishi, M., Cleves, P. A., Pringle, J. R., Grossman, A. R.
  2018; 176 (2): 1793–1807

- **Evidence for miRNA-mediated modulation of the host transcriptome in cnidarian-dinoflagellate symbiosis** *MOLECULAR ECOLOGY*
  Baumgarten, S., Cziesielski, M. J., Thomas, L., Michell, C. T., Esherick, L. Y., Pringle, J. R., Aranda, M., Voolstra, C. R.
  2018; 27 (2): 403–18

- **Robust Transgene Expression from Bicistronic mRNA in the Green Alga Chlamydomonas reinhardtii.** *G3 (Bethesda, Md.)*
  Onishi, M., Pringle, J. R.
  2016

- **Relative Contributions of Various Cellular Mechanisms to Loss of Algae during Cnidarian Bleaching** *PLOS ONE*
  Bieri, T., Onishi, M., Xiang, T., Grossman, A. R., Pringle, J. R.
  2016; 11 (4)

- **Evidence That an Unconventional Actin Can Provide Essential F-Actin Function and That a Surveillance System Monitors F-Actin Integrity in Chlamydomonas.** *Genetics*
  Onishi, M., Pringle, J. R., Cross, F. R.
  2016; 202 (3): 977-996

- **Analysis of Rho-GTPase Activity During Budding Yeast Cytokinesis.** *Methods in molecular biology (Clifton, N.J.)*
  Onishi, M., Pringle, J. R.
  2016; 1369: 205-218

- **The nonopisthokont septins: How many there are, how little we know about them, and how we might learn more.** *Methods in cell biology*
  Onishi, M., Pringle, J. R.
  2016; 136: 1-19

- **Forty-five years of cell-cycle genetics** *MOLECULAR BIOLOGY OF THE CELL*
  Reid, B. J., Culotti, J. G., Nash, R. S., Pringle, J. R.
  2015; 26 (24): 4307-4312

- **The genome of Aiptasia, a sea anemone model for coral symbiosis** *PROCEEDINGS OF THE NATIONAL ACADEMY OF SCIENCES OF THE UNITED STATES OF AMERICA*
  Baumgarten, S., Simakov, O., Esherick, L. Y., Liew, Y. J., Lehnert, E. M., Michell, C. T., Li, Y., Hambleton, E. A., Guse, A., Oates, M. E., Gough, J., Weis, V. M., Aranda, et al
  2015; 112 (38): 11893-11898

- **Cytokinesis breaks dicentric chromosomes preferentially at pericentromeric regions and telomere fusions.** *Genes & development*
  Lopez, V., Barinova, N., Onishi, M., Pobiega, S., Pringle, J. R., Dubrana, K., Marcand, S.

2015; 29 (3): 322-336

- **Rapid, Precise, and Accurate Counts of Symbiodinium Cells Using the Guava Flow Cytometer, and a Comparison to Other Methods.** *PloS one*
  Krediet, C. J., DeNofrio, J. C., Caruso, C., Burriesci, M. S., Cella, K., Pringle, J. R.
  2015; 10 (8)
- **Regulation of spindle pole body assembly and cytokinesis by the centrin-binding protein Sfi1 in fission yeast** *MOLECULAR BIOLOGY OF THE CELL*
  Lee, I., Wang, N., Hu, W., Schott, K., Baehler, J., Giddings, T. H., Pringle, J. R., Du, L., Wu, J.
  2014; 25 (18): 2735-2749
- **Regulation of spindle pole body assembly and cytokinesis by the centrin-binding protein Sfi1 in fission yeast.** *Molecular biology of the cell*
  Lee, I., Wang, N., Hu, W., Schott, K., Bähler, J., Giddings, T. H., Pringle, J. R., Du, L., Wu, J.
  2014; 25 (18): 2735-2749
- **Actin Is Required for IFT Regulation in Chlamydomonas reinhardtii** *CURRENT BIOLOGY*
  Avasthi, P., Onishi, M., Karpiak, J., Yamamoto, R., Mackinder, L., Jonikas, M. C., Sale, W. S., Shoichet, B., Pringle, J. R., Marshall, W. F.
  2014; 24 (17): 2025-2032
- **Actin is required for IFT regulation in Chlamydomonas reinhardtii.** *Current biology*
  Avasthi, P., Onishi, M., Karpiak, J., Yamamoto, R., Mackinder, L., Jonikas, M. C., Sale, W. S., Shoichet, B., Pringle, J. R., Marshall, W. F.
  2014; 24 (17): 2025-2032
- **Similar specificities of symbiont uptake by adults and larvae in an anemone model system for coral biology** *JOURNAL OF EXPERIMENTAL BIOLOGY*
  Hambleton, E. A., Guse, A., Pringle, J. R.
  2014; 217 (9): 1613-1619
- **Extensive differences in gene expression between symbiotic and aposymbiotic cnidarians.** *G3 (Bethesda, Md.)*
  Lehnert, E. M., Mouchka, M. E., Burriesci, M. S., Gallo, N. D., Schwarz, J. A., Pringle, J. R.
  2014; 4 (2): 277-295
- **An enduring enthusiasm for academic science, but with concerns** *MOLECULAR BIOLOGY OF THE CELL*
  Pringle, J. R.
  2013; 24 (21): 3281-3284
- **Coral bleaching independent of photosynthetic activity.** *Current biology*
  Tolleter, D., Seneca, F. O., DeNofrio, J. C., Krediet, C. J., Palumbi, S. R., Pringle, J. R., Grossman, A. R.
  2013; 23 (18): 1782-1786
- **Distinct roles of Rho1, Cdc42, and Cyk3 in septum formation and abscission during yeast cytokinesis** *JOURNAL OF CELL BIOLOGY*
  Onishi, M., Ko, N., Nishihama, R., Pringle, J. R.
  2013; 202 (2): 311-329
- **Isolation of clonal axenic strains of the symbiotic dinoflagellate Symbiodinium and their growth and host specificity** *JOURNAL OF PHYCOLOGY*
  Xiang, T., Hambleton, E. A., DeNofrio, J. C., Pringle, J. R., Grossman, A. R.
  2013; 49 (3): 447-458
- **Identification of symbiotic-specific genes reveals a role for host immunity in a cnidarian-dinoflagellate mutualism** *Annual Meeting of the Society-for-Integrative-and-Comparative-Biology (SICB)*
  Mouchka, M. E., Lehnert, E. M., Burriesci, M. S., Schwarz, J., Pringle, J. R.
  OXFORD UNIV PRESS INC.2013: E150–E150
- **Role of endocytosis in localization and maintenance of the spatial markers for bud-site selection in yeast.** *PloS one*
  Tuo, S., Nakashima, K., Pringle, J. R.
  2013; 8 (9)
- **Isolation of clonal axenic strains of the symbiotic dinoflagellate Symbiodinium and their growth and host specificity(1).** *Journal of phycology*
  Xiang, T., Hambleton, E. A., DeNofrio, J. C., Pringle, J. R., Grossman, A. R.
  2013; 49 (3): 447–58
- **Apparent Defect in Yeast Bud-Site Selection Due to a Specific Failure to Splice the Pre-mRNA of a Regulator of Cell-Type-Specific Transcription** *PLOS ONE*

Tuo, S., Nakashima, K., Pringle, J. R.
2012; 7 (10)

- **Evidence that glucose is the major transferred metabolite in dinoflagellate-cnidarian symbiosis** *JOURNAL OF EXPERIMENTAL BIOLOGY*
Burriesci, M. S., Raab, T. K., Pringle, J. R.
2012; 215 (19): 3467-3477

- **Fission yeast Cyk3p is a transglutaminase-like protein that participates in cytokinesis and cell morphogenesis** *MOLECULAR BIOLOGY OF THE CELL*
Pollard, L. W., Onishi, M., Pringle, J. R., Lord, M.
2012; 23 (13): 2433-2444

- **Developing the anemone Aiptasia as a tractable model for cnidarian-dinoflagellate symbiosis: the transcriptome of aposymbiotic A. pallida** *BMC GENOMICS*
Lehnert, E. M., Burriesci, M. S., Pringle, J. R.
2012; 13

- **Fulcrum: condensing redundant reads from high-throughput sequencing studies** *BIOINFORMATICS*
Burriesci, M. S., Lehnert, E. M., Pringle, J. R.
2012; 28 (10): 1324-1327

- **Evidence that a septin diffusion barrier is dispensable for cytokinesis in budding yeast** *BIOLOGICAL CHEMISTRY*
Wloka, C., Nishihama, R., Onishi, M., Oh, Y., Hanna, J., Pringle, J. R., Krauss, M., Bi, E.
2011; 392 (8-9): 813-829

- **New insights into the phylogenetic distribution and evolutionary origins of the septins** *BIOLOGICAL CHEMISTRY*
Nishihama, R., Onishi, M., Pringle, J. R.
2011; 392 (8-9): 681-687

- **Cooperation Between the Septins and the Actomyosin Ring and Role of a Cell-Integrity Pathway During Cell Division in Fission Yeast** *GENETICS*
Wu, J., Ye, Y., Wang, N., Pollard, T. D., Pringle, J. R.
2010; 186 (3): 897-U232

- **Role of Septins in the Orientation of Forespore Membrane Extension during Sporulation in Fission Yeast** *MOLECULAR AND CELLULAR BIOLOGY*
Onishi, M., Koga, T., Hirata, A., Nakamura, T., Asakawa, H., Shimoda, C., Baehler, J., Wu, J., Takegawa, K., Tachikawa, H., Pringle, J. R., Fukui, Y.
2010; 30 (8): 2057-2074

- **Role of Inn1 and its interactions with Hof1 and Cyk3 in promoting cleavage furrow and septum formation in S. cerevisiae** *JOURNAL OF CELL BIOLOGY*
Nishihama, R., Schreiter, J. H., Onishi, M., Vallen, E. A., Hanna, J., Moravcevic, K., Lippincott, M. F., Han, H., Lemmon, M. A., Pringle, J. R., Bi, E.
2009; 185 (6): 995-1012

- **Generation and analysis of transcriptomic resources for a model system on the rise: the sea anemone Aiptasia pallida and its dinoflagellate endosymbiont** *BMC GENOMICS*
Sunagawa, S., Wilson, E. C., Thaler, M., Smith, M. L., Caruso, C., Pringle, J. R., Weis, V. M., Medina, M., Schwarz, J. A.
2009; 10

- **Development of an Aiptasia pallida Cell-culture System to Study Cnidarian-Dinoflagellate Symbiosis.**
Denofrio, J., Pringle, J.
SPRINGER.2009: S48–S48

- **The Anaphase-promoting Complex Promotes Actomyosin-Ring Disassembly during Cytokinesis in Yeast** *MOLECULAR BIOLOGY OF THE CELL*
Tully, G. H., Nishihama, R., Pringle, J. R., Morgan, D. O.
2009; 20 (4): 1201-1212

- **A role for very-long-chain fatty acids in furrow ingression during cytokinesis in Drosophila spermatocytes** *CURRENT BIOLOGY*
Szafer-Glusman, E., Giansanti, M. G., Nishihama, R., Bolival, B., Pringle, J., Gatti, M., Fuller, M. T.
2008; 18 (18): 1426-1431

- **Cell biology in model systems as the key to understanding corals** *TRENDS IN ECOLOGY & EVOLUTION*
Weis, V. M., Davy, S. K., Hoegh-Guldberg, O., Rodriguez-Lanetty, M., Pringe, J. R.
2008; 23 (7): 369-376

- **Control of 5-FOA and 5-FU resistance by Saccharomyces cerevisiae YJL055W** *YEAST*
  Ko, N., Nishhama, R., Pringle, J. R.
  2008; 25 (2): 155-160

- **Origins and development of the septin field.** *In "The Septins" (P.A. Hall, S.E.H. Russell & J.R. Pringle, eds.). Wiley-Blackwell.*
  Pringle JR
  2008: 7-34

- **Identification of yeast IQGAP (Iqg1p) as an anaphase-promoting-complex substrate and its role in actomyosin-ring-independent cytokinesis** *MOLECULAR BIOLOGY OF THE CELL*
  Ko, N., Nishihama, R., Tully, G. H., Ostapenko, D., Solomon, M. J., Morgan, D. O., Pringle, J. R.
  2007; 18 (12): 5139-5153

- **Role of cell cycle-regulated expression in the localized incorporation of cell wall proteins in yeast** *MOLECULAR BIOLOGY OF THE CELL*
  Smits, G. J., Schenkman, L. R., Brul, S., Pringle, J. R., Klis, F. M.
  2006; 17 (7): 3267-3280

- **Role of a Cdc42p effector pathway in recruitment of the yeast septins to the presumptive bud site** *MOLECULAR BIOLOGY OF THE CELL*
  Iwase, M., Luo, J. Y., Nagaraj, S., Longtine, M., Kim, H. B., Haarer, B. K., Caruso, C., Tong, Z. T., Pringle, J. R., Bi, E. F.
  2006; 17 (3): 1110-1125

- **Cytoskeleton and morphogenesis.** *In "Landmark Papers in Yeast Biology" (P. Linder, M. Hall & D. Shore, eds.). Cold Spring Harbor Laboratory Press.*
  Pringle JR
  2006: 211-241

- **Interactions among Rax1p, Rax2p, Bud8p, and Bud9p in marking cortical sites for bipolar bud-site selection in yeast.** *Molecular biology of the cell*
  Kang, P. J., Angerman, E., Nakashima, K., Pringle, J. R., Park, H.
  2004; 15 (11): 5145-5157

- **Interactions among Rax1p, Rax2p, marking cortical sites for bipolar yeast** *MOLECULAR BIOLOGY OF THE CELL*
  Kang, P. J., Angerman, E., Nakashima, K., Pringle, J. R., Park, H. O.
  2004; 15 (11): 5145-5157

- **The role of Cdc42p GTPase-activating proteins in assembly of the septin ring in yeast** *MOLECULAR BIOLOGY OF THE CELL*
  Caviston, J. P., Longtine, M., Pringle, J. R., Bi, E.
  2003; 14 (10): 4051-4066

- **Mammalian septins nomenclature** *MOLECULAR BIOLOGY OF THE CELL*
  Macara, I. G., Baldarelli, R., Field, C. M., Glotzer, M., Hayashi, Y., Hsu, S. C., Kennedy, M. B., Kinoshita, M., Longtine, M., Low, C., Maltais, L. J., McKenzie, L., Mitchison, et al
  2002; 13 (12): 4111-4113

- **Bni5p, a septin-interacting protein, is required for normal septin function and cytokinesis in Saccharomyces cerevisiae** *MOLECULAR AND CELLULAR BIOLOGY*
  Lee, P. R., Song, S., Ro, H. S., Park, C. J., Lippincott, J., Li, R., Pringle, J. R., De Virgilio, C., Longtine, M. S., Lee, K. S.
  2002; 22 (19): 6906-6920

- **Identification of septin-interacting proteins and characterization of the Smt3/SUMO-conjugation system in Drosophila** *JOURNAL OF CELL SCIENCE*
  Shih, H. P., Hales, K. G., Pringle, J. R., Peifer, M.
  2002; 115 (6): 1259-1271

- **The role of cell cycle-regulated expression in the localization of spatial landmark proteins in yeast** *JOURNAL OF CELL BIOLOGY*
  Schenkman, L. R., Caruso, C., Page, N., Pringle, J. R.
  2002; 156 (5): 829-841

- **The septin cortex at the yeast mother-bud neck** *CURRENT OPINION IN MICROBIOLOGY*
  Gladfelter, A. S., Pringle, J. R., Lew, D. J.
  2001; 4 (6): 681-689

- **A protein interaction map for cell polarity development** *JOURNAL OF CELL BIOLOGY*

Drees, B. L., Sundin, B., Brazeau, E., Caviston, J. P., Chen, G. C., Guo, W., Kozminski, K. G., Lau, M. W., Moskow, J. J., Tong, A., Schenkman, L. R., McKenzie, A., Brennwald, et al
2001; 154 (3): 549-571

- **Bud8p and Bud9p, proteins that may mark the sites for bipolar budding in yeast** *MOLECULAR BIOLOGY OF THE CELL*
  Harkins, H. A., Page, N., Schenkman, L. R., De Virgilio, C., Shaw, S., Bussey, H., Pringle, J. R.
  2001; 12 (8): 2497-2518
- **Roles of a fimbrin and an alpha-actinin-like protein in fission yeast cell polarization and cytokinesis** *MOLECULAR BIOLOGY OF THE CELL*
  Wu, J. Q., Bahler, J., Pringle, J. R.
  2001; 12 (4): 1061-1077
- **Evidence for functional differentiation among Drosophila septins in cytokinesis and cellularization** *MOLECULAR BIOLOGY OF THE CELL*
  Adam, J. C., Pringle, J. R., Peifer, M.
  2000; 11 (9): 3123-3135
- **Septin-dependent assembly of a cell cycle-regulatory module in Sacharomyces cerevisiae** *MOLECULAR AND CELLULAR BIOLOGY*
  Longtine, M. S., Theesfeld, C. L., McMillan, J. N., Weaver, E., Pringle, J. R., Lew, D. J.
  2000; 20 (11): 4049-4061
- **Identification of novel, evolutionarily conserved Cdc42p-interacting proteins and of redundant pathways linking Cdc24p and Cdc42p to actin polarization in yeast** *MOLECULAR BIOLOGY OF THE CELL*
  Bi, E. F., Chiavetta, J. B., Chen, H., Chen, G. C., Chan, C. S., Pringle, J. R.
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- **Cytokinesis: an emerging unified theory for eukaryotes?** *CURRENT OPINION IN CELL BIOLOGY*
  Hales, K. G., Bi, E., Wu, J. Q., Adam, J. C., Yu, I. C., Pringle, J. R.
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- **The morphogenesis checkpoint in Saccharomyces cerevisiae: Cell cycle control of Swe1p degradation by Hsl1p and Hsl7p** *MOLECULAR AND CELLULAR BIOLOGY*
  McMillan, J. N., Longtine, M. S., Sia, R. A., Theesfeld, C. L., Bardes, E. S., Pringle, J. R., Lew, D. J.
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- **Role of polo kinase and Mid1p in determining the site of cell division in fission yeast** *JOURNAL OF CELL BIOLOGY*
  Bahler, J., Steever, A. B., Wheatley, S., Wang, Y. L., Pringle, J. R., Gould, K. L., McCollum, D.
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- **Role of the yeast Gin4p protein kinase in septin assembly and the relationship between septin assembly and septin function** *JOURNAL OF CELL BIOLOGY*
  Longtine, M. S., Fares, H., Pringle, J. R.
  1998; 143 (3): 719-736
- **Polymerization of purified yeast septins: Evidence that organized filament arrays may not be required for septin function** *JOURNAL OF CELL BIOLOGY*
  Frazier, J. A., Wong, M. L., Longtine, M. S., Pringle, J. R., Mann, M., Mitchison, T. J., Field, C.
  1998; 143 (3): 737-749
- **Involvement of an actomyosin contractile ring in Saccharomyces cerevisiae cytokinesis** *JOURNAL OF CELL BIOLOGY*
  Bi, E., Maddox, P., Lew, D. J., Salmon, E. D., McMillan, J. N., Yeh, E., Pringle, J. R.
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- **Elevated expression of chitinase 1 and chitin synthesis in Myosin II-deficient Saccharomyces cerevisiae** *CELLULAR AND MOLECULAR BIOLOGY*
  Rodiguez-Medina, J. R., Cruz, J. A., Robbins, P. W., Bi, E., Pringle, J. R.
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- **Heterologous modules for efficient and versatile PCR-based gene targeting in Schizosaccharomyces pombe** *YEAST*
  Bahler, J., Wu, J. Q., Longtine, M. S., Shah, N. G., McKenzie, A., Steever, A. B., Wach, A., Philippsen, P., Pringle, J. R.
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- **Additional modules for versatile and economical PCR-based gene deletion and modification in Saccharomyces cerevisiae** *YEAST*
  Longtine, M. S., McKenzie, A., DeMarini, D. J., Shah, N. G., Wach, A., Brachat, A., Philippsen, P., Pringle, J. R.
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  Bahler, J., Pringle, J. R.
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  DeMarini, D. J., Adams, A. E., Fares, H., DEVIRGILIO, C., Valle, G., Chuang, J. S., Pringle, J. R.
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- **Two active states of the Ras-related Bud1/Rsr1 protein bind to different effectors to determine yeast cell polarity** *PROCEEDINGS OF THE NATIONAL ACADEMY OF SCIENCES OF THE UNITED STATES OF AMERICA*
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- **Bni1p, a yeast formin linking Cdc42p and the actin cytoskeleton during polarized morphogenesis** *SCIENCE*
  Evangelista, M., Blundell, K., Longtine, M. S., Chow, C. J., ADAMES, N., Pringle, J. R., Peter, M., Boone, C.
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- **Aip3p/Bud6p, a yeast actin-interacting protein that is involved in morphogenesis and the selection of bipolar budding sites** *MOLECULAR BIOLOGY OF THE CELL*
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