



FIGURE P5-3

Data for Problems 5-16 to 5-20

- †5-16 Design a linkage to carry the body in Figure P5-3 through the two positions P_1 and P_2 at the angles shown in the figure. Use analytical synthesis without regard for the fixed pivots shown.
- †5-17 Design a linkage to carry the body in Figure P5-3 through the two positions P_2 and P_3 at the angles shown in the figure. Use analytical synthesis without regard for the fixed pivots shown.
- †5-18 Design a linkage to carry the body in Figure P5-3 through the three positions P_1 , P_2 , and P_3 at the angles shown in the figure. Use analytical synthesis without regard for the fixed pivots shown.
- *†5-19 Design a linkage to carry the body in Figure P5-3 through the three positions P_1 , P_2 , and P_3 at the angles shown in the figure. Use analytical synthesis and design it for the fixed pivots shown.
- †5-20 Write a program to generate and plot the circle-point and center-point circles for Problem 5-19 using an equation solver or any programming language.

* Answers in Appendix F.

† These problems are suited to solution using *Mathcad*, *Matlab*, or *TKSolver* equation solver programs. In most cases, your solution can be checked with program *FOURBAR*, *SLIDER*, or *SIXBAR*.