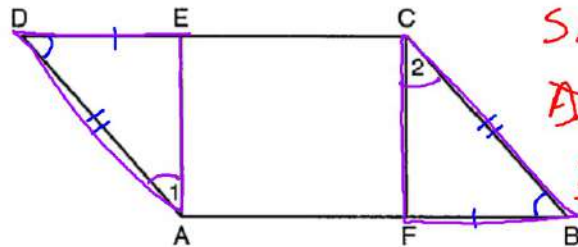


Given: $\square ABCD$
 $\overline{DE} \cong \overline{FB}$

Prove: a) $\triangle DEA \cong \triangle BFC$
 b) $\angle 1 \cong \angle 2$



ASA AAS
 SAS HL
~~ASS~~
 SSS
 CPCTC

STATEMENT

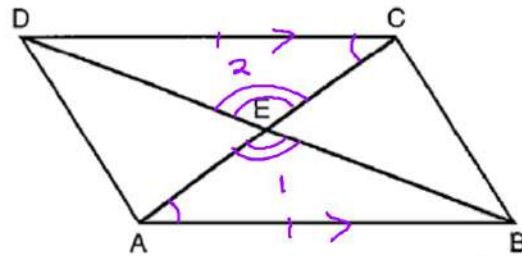
REASONS

1. Parallelogram ABCD
2. $\overline{AD} \cong \overline{BC}$
3. $\angle D \cong \angle B$
4. $\overline{DE} \cong \overline{FB}$
5. $\triangle DEA \cong \triangle BFC$
6. $\angle 1 \cong \angle 2$

1. Given
2. opposite sides of $\square \cong$
3. Opposite \angle 's of $\square \cong$
4. Given
5. SAS
6. CPCTC

Given: \square ABCD

Prove: $\triangle AEB \cong \triangle CED$



STATEMENT	REASONS
1. Parallelogram ABCD	1. Given
2. $\overline{AB} \cong \overline{CD}$	2. Opposite sides $\square \cong$.
3. $\overline{AB} \parallel \overline{CD}$	3. Opposite sides $\square \parallel$.
4. $\angle CAB \cong \angle ACD$	4. Alternate Interior \angle 's \cong
5. $\angle AEB \cong \angle CED$	5. Vertical \angle 's \cong
6. $\triangle AEB \cong \triangle CED$	6. AAS

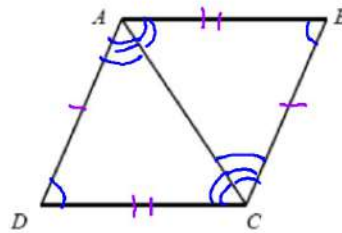
Given:

$\square ABCD$

Prove:

$\triangle DAC \cong \triangle BCA$

(At most 6 steps! You may not need all 6!!!)



Statements

Reasons

1 $ABCD$ is Parallelogram

1 Given

2

2

3

3

4

4

5

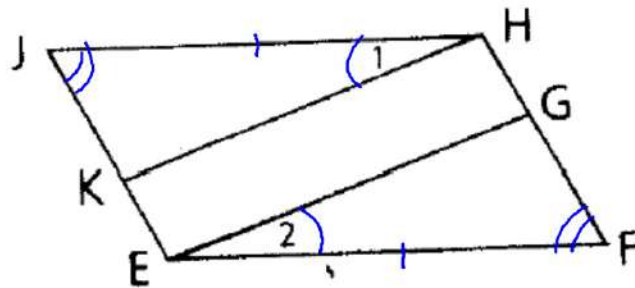
5

6

6

Given: $\square EFHJ$,
 $\angle 1 \cong \angle 2$

Conclusion: $\overline{KH} \cong \overline{EG}$



Statements

Reasons

1) $EFHJ$ is Parallelogram

2) $\overline{JH} \cong \overline{FE}$

3) $\angle J \cong \angle F$

4) $\triangle JHK \cong \triangle FGG$

5) $\overline{KH} \cong \overline{EG}$

1) Given

2) Opposite side $\square \cong$

3) Opposite \angle 's of $\square \cong$

4) ASA

5) CPCTC

