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### Backman et al.

### [54] SELECTIVE DIVERSITY COMBINING

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- [21] Appl. No.: 08/861,541
- [22] Filed: May 21, 1997
- [51] Int. Cl.<sup>7</sup> ..... H04B 7/08; H04L 1/02

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Primary Examiner—Stephen Chin

[11]

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[57]

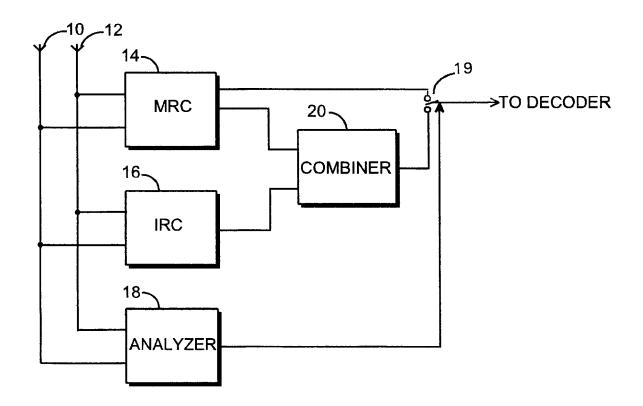
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ABSTRACT

A method and system for combining signals in a receiver employing antenna diversity. If the interference exceeds a predetermined threshold, interference rejection combining (IRC) is used. If the interference does not exceed the predetermined threshold, maximum ratio combining (MRC) is used. The diversity combining technique can be selected, and the signals combined every burst, half-burst, or other suitable interval.

### 31 Claims, 6 Drawing Sheets



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FIG. 1

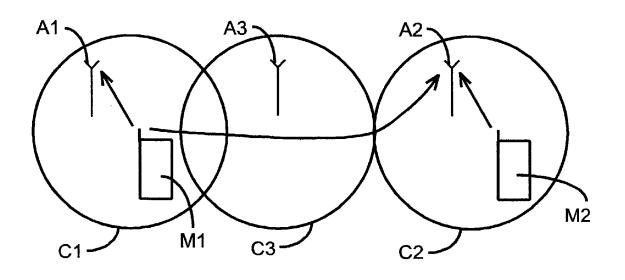
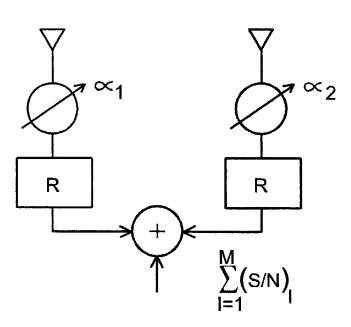


FIG. 2



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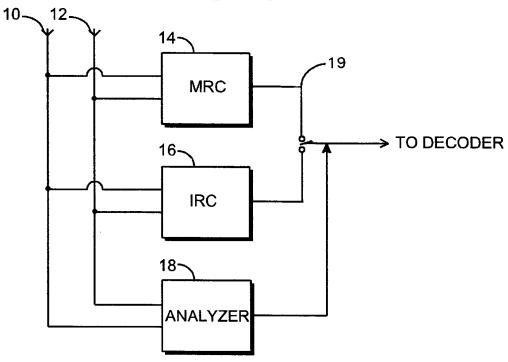
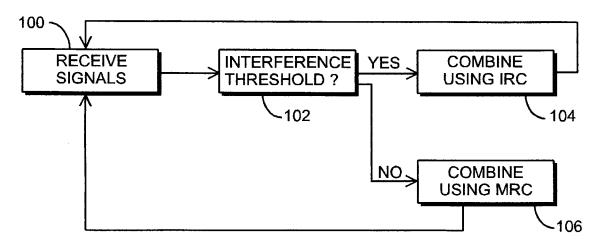


FIG. 4



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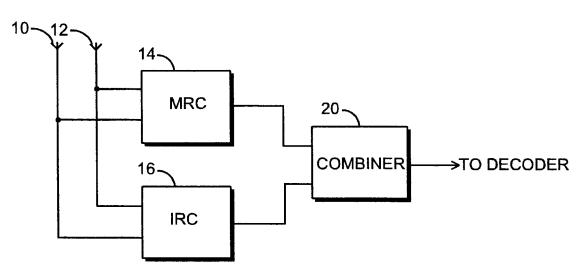
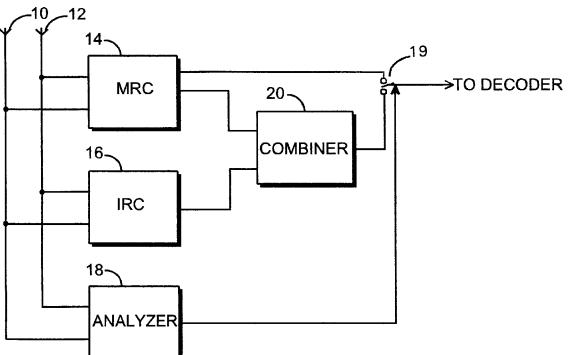
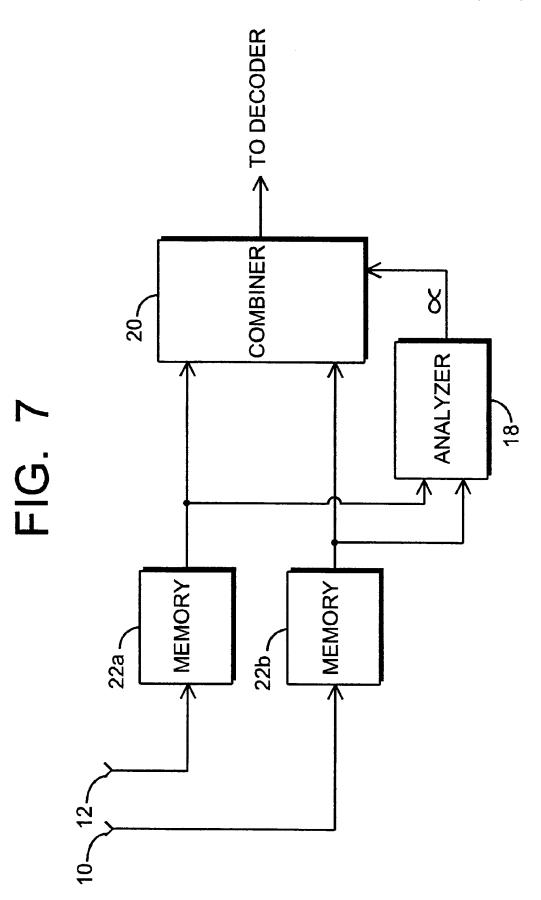


FIG. 6



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