5th International Symposium on Information and Knowledge Management (ISIKM2022)
March 25-26, 2022

Full Title of Your Paper

Peng Shi[1], Yuanqing Xia[1,*] and Junhu Ruan[2]

[1]School of Technology
University of Glamorgan
Pontypridd, Wales, CF37 1DL, United Kingdom
pshi@glam.ac.uk; *Corresponding author: yxia@glam.ac.uk

[2]College of Economics and Management
Northwest A&F University
No. 3, Taicheng Road, Yangling 712100, P. R. China
rjh@nwsuaf.edu.cn

Received XXX 2021; accepted XXX 2022

1. **Introduction.** Please write down the Introduction of your paper here...

2. **Research Questions.** Please write down research questions in this section. When you cite some references, please give numbers, such as, ... In the work of [1-3,5], the problem of... For more results on this topic, we refer readers to [1,4,5] and the references therein...

3. **Methodologies.** Please write down methodologies employed in this paper...
Examples for writing definition, lemma, theorem, corollary, example, remark.
Definition 3.1. *System (1) is stable if and only if...*
Lemma 3.1. *If system (1) is stable, then...*
Corollary 3.1. *If there is no uncertainty in system (1), i.e.,* $\triangle A = 0$*, then...*
Example 3.1. *Let us consider the following example...*

$$\dot{x}(t) = Ax(t) + Bu(t) + B_1 w(t) \quad (1)$$
$$y(t) = Cx(t) + Du(t) + D_1 w(t) \quad (2)$$

Lemma 3.2. *If system (3)-(4) is stable, then...*

$$\dot{x}(t) = Ax(t) + Bu(t) + B_2 w(t) \quad (3)$$
$$y(t) = Cx(t) + Du(t) + D_2 w(t) \quad (4)$$

Theorem 3.1. *Consider system (3) with the control law...*
Proof: Let...
Remark 3.1. *It should be noted that the result in Theorem 3.1...*

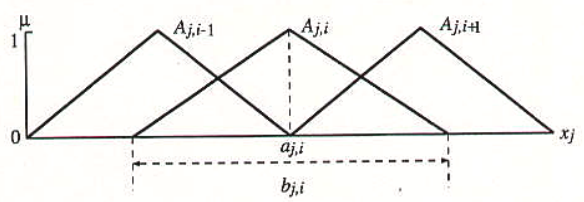

FIGURE 1. Triangular-type membership functions for x_j

4. **Results.** In this section, we present...

TABLE 1. Fuzzy rule table by FSTRM

x_1 / x_2	A_{21}	...	A_{2j}	...	A_{2k}
A_{11}	w_1/y_1	...	w_j/y_j	...	w_k/y_k
A_{12}	w_{k+1}/y_{k+1}	...	w_{k+j}/y_{k+j}	...	w_{2k}/y_{2k}
...			...		
A_{1i}	...	...	$w_{(i-1)k+j}/y_{(i-1)k+j}$		...
...			...		
A_{1r}	$w_{(i-1)k+1}/y_{(r-1)k+1}$	...			w_{rk}/y_{rk}

5. Conclusion. From this study, we can conclude that...

REFERENCES

[1] M. Mahmoud and P. Shi, *Methodologies for Control of Jump Time-delay Systems*, Kluwer Academic Publishers, Boston, 2003.

[2] P. Shi, Limited Hamilton-Jacobi-Isaacs equations for singularly perturbed zero-sum dynamic (discrete time) games, *SIAM J. Control and Optimization*, vol.41, no.3, pp.826-850, 2002.

[3] S. K. Nguang and P. Shi, Fuzzy H-infinity output feedback control of nonlinear systems under sampled measurements, *Automatica*, vol.39, no.12, pp.2169-2174, 2003.

[4] E. K. Boukas, Z. Liu and P. Shi, Delay-dependent stability and output feedback stabilization of Markov jump systems with time-delay, *IEE-Part D, Control Theory and Applications*, vol.149, no.5, pp.379-386, 2002.

[5] P. Shi, E. K. Boukas and R. K. Agarwal, H_I control of discrete-time linear uncertain systems with delayed-state, *Proc. of 37th IEEE Conference on Decision & Control*, Tampa, Florida, pp.4551-4552, 1998.